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# GKT Gazette

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# GAZETTE

# GKT



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# Passim: Changing Tides



Editors - Arnav Umranikar & Morgan Bailey

## MBBS3

We'd like to wish you a very hearty welcome to this issue of the *Guy's, King's, and St Thomas' Gazette*, both to our new readers and returning ones. We have something for everyone in this Freshers edition.

Let us introduce ourselves. We are your student voice; a completely independent, entirely student-led journal focussing on the life at GKT, in its many rich and varied forms. We serve as a democratic forum to the allied health schools and hospitals, fashioning a dialogue between students, staff & faculty, and alumni. We provide the platform for you to showcase your writing, your art, your poetry – and everything in between.

We have been doing this for over 150 years – sending each issue to the British Library and the Wellcome Collection. We were recently crowned the Medical Student Association's Society of the Year.

This brings us to our current edition; a reflection of the changing times in our world. From technological revolutions, the life and times of the NHS, and the recent happenings of the medical school & beyond. To anecdotes of times begone, memories of great figures now passed and the timeless power of art. Our world is one of change, a tango between old and new. Although tides may change, the sea will always come ashore - may the Gazette live forevermore.

Let us leave you with some words from our predecessor, 115 years ago.

*'May we congratulate you on your choice, not only of your Profession, but also of your Medical School'.*

Congratulations and welcome to GKT.

Yours,

*The Editors*



We welcome submissions from anybody affiliated with GKT to be published in subsequent issues. If you are a student and would like to join the Editorial Committee to be involved in crafting future editions, keep an eye out on our social media regarding our recruitment rounds.

Dare Quam Accipere

# Letters to the Gazette



## The Royal Dental Hospital Crest

Dear the Editors,

You might be interested to know about the photo of the Shield. In about 1959 students at RDH, learning about dental materials, had to construct a shield for themselves. They first learned about the properties of materials. Then, under the supervision of a dental mechanic teacher, they learned to construct these shields – with each part being constructed in a different metal.

The one pictured was made by my wife, then Marilyn Joseph.

Yours truly,

Stanley Gelbier  
**Honorary Professor in the History of  
Dentistry, KCL**



## Resurrection of the Gazette

Dear the Editors,

Not only have you resurrected the Gazette but you have produced a very interesting and informative issue to celebrate the 150th anniversary [volume 133, issue 1, no. 2597]. I can't tell you how pleased I was to see it in my letter box. I was just about to cancel my standing order!

I have been a subscriber for many years, certainly since qualifying at Guy's some 60 years ago. Our anniversary was celebrated with a lunch in the Robens Suite last November with as many of our able bodies contemporaries as we could find! Long may the Gazette live on

Wishing you the very best of luck,

Rosemary Millis



## 150th Anniversary of the Gazette

Dear the Editors,

I was interested to read the 150th anniversary edition of the GKT gazette and would like to congratulate all involved on the new edition and for reviving the publication.

On the same week as reading the article I visited the Imperial War Museum, London and noted in the Holocaust Gallery that there was reference to the medical students who attended Belsen to help the survivors.

I consider that this article would supplement the information that the museum holds regarding this and have therefore suggested that they might contact you in order to obtain the correct permissions from the author to use this.

With kind regards,

Michael Thomas **BDS, MSc, LDSRCS,  
FCGDent, MRDRCS, FICD**  
**Senior Teaching Fellow**

## Previous Editor's Comments

*Dear the Editors,*

*As a previous editor of the Guys Gazette, GKT Gazette and studentBMJ it was with great delight that I read today of the revival of the GKT publication! Every blessing with your efforts.*

*Yours,*

Rev Dr Jason Roach

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## Covers and Photos

*All photos are taken by our editorial committee or royalty free stock images unless otherwise stated.*

Our front cover is a photograph, taken in December 2021 by Morgan Bailey MBBS3

Our back cover is an illustration, kindly provided to us by Shreya Mittal MBBS3 - We chose to put Shreya's pastiche excerpt of Michelangelo's 'Creation of Adam' on the back of our cover, for its multifold symbolism. The fact it is an excerpt means the viewer's interpretation of the artwork is not necessarily constrained by the rest of the scene, on the ceiling of the Sistine Chapel. Do you see God imbuing Adam with life? A hand reaching out to help another, a symbol of togetherness? Whatever you may feel, we felt it chimed in with the general theme of our issue; the metaphorical passing of the baton from the old to the new.



*Photo: Volume 97 UMDS No  
2329 - 29th January 1983*

# Features



# A 1908 Welcome...

Sourced and abridged from the 19th September 1908 Issue of the Guy's Hospital Gazette. Written by "L.M", the Editor of that issue.

Doubtlessly many considerations may have led to your becoming a disciple of Aesculapius. Maybe in the prattle of your childhood's days you gave some early sign of a penchant for medicine, the desire being innate and growing stronger as you reached more mature years ; then verily may we say that you have adopted a vocation—a vocation in the sense that you feel you have been called to your work. Or perhaps you are the descendant of a series of medicos, and, willynilly, it is a doctor you are to become; yet again your reason may be simply to gratify parental wishes. Whichever it be, here you are, and may we congratulate you on your choice, not only of your Profession, but also of your Medical School.

We take it for granted that you have entered the portals of medicine with your minds fully acquainted with its advantages and disadvantages. Of late, the lay papers have drawn much attention to the material recompenses of a doctor. If you have followed these " silly season " discussions, you will be disillusioned as regards little work and fabulous wealth. No, the profession is one to which application is essential. Of course, you have an understanding of the beauties of your future labour, a labour which is noble in every trait. To care for and prolong human life, to dispel suffering and sorrow, and to ever seek Truth in all things— such are its aims. These, well done, are compensations as great

and greater than mere gold. The Life is one of ever-increasing interest and usefulness. Your daily contact with humanity — a kaleidoscopic procession of beings brought on to a common plane by suffering—will teach you Life, with a big capital L. Year by year you will realise these things, and will thank Providence that you have chosen so wisely.

It is only natural that for some few days your new associates and environment will make you feel a little strange. But it is remarkable how quickly that passes off. Several of you may be 'Varsity men, and find friends and men from your College already here. You may feel that Guy's is but a minor shrine—that your College, with its great traditions, is your real Alma Mater. Then slowly and surely that great Unseen Force, the genius loci will work wonders. It will co-operate you all, weld you into body, coherent and strong, in which the linking force is an esprit de corps of traditional fame. In a few words you will be Guy's men, and you will worship at one shrine only.

What are the factors which have conduced to this powerful esprit de corps? Briefly may they be chronicled—good work and good play. In both you are helped to the utmost by your choice of Medical School. You have the material at hand, and it is for you to make your own career. Too much devotion to the one or the





other must perforce lead to disaster. The old trite adage, “All work and no play, etc.,” is only too true. What do medals and scholarships avail if your constitution is damaged beyond repair for lack of sufficient exercise? And, again, on the other hand, too much play and no work makes Jack a very dull boy; so steer a middle course and temper your studies with healthy exercises.

As regards your work, the first year or so is filled to overflowing with subjects which seem to have but a too small direct bearing on your future work. But they educate the scientific spirit, and of all things in medicine that is the spirit to be fostered; yet still again—and maybe more important—the examiners require a certain knowledge of the Syllabus, so we are afraid this year’s work will demand a great deal of your attention. You will find it interesting, especially if you attend to its practical side; therefore, bear in mind the laboratory work. Lectures have to be attended, the powers that be—the examining bodies—have ordained it; if you “cut” them, remember you are the loser; in your later years, when you are in the wards, any similar neglect of your duties will not only recoil upon yourself, but also upon your patients; so, do not cultivate this “cutting” habit.

As regards recreation, as members of the Clubs’ Union, you are singularly well off. In the field of Athletics there are the Rugby and Association

Football Clubs, Cricket, Hockey, Golf, Swimming, Cross-country, Boxing, Gymnastics, and Athletic Associations. At Honor Oak Park, easy of access—acquaint yourselves early with this fact—we are the proud possessors of a magnificent ground. The Debating, Physical, and Dental Societies will afford you opportunities to distinguish yourself either as a good speaker or a good listener; do not let the fact of your being a new arrival hinder you from attending the meetings of these societies; you will be always welcome.

One thing we assure you, and that is, before being long here the love which the dear old place instils into all will come to you, and as the years pass by—all too quickly—you will realize what a great hold it gets of one. Then will you understand that sigh of regret, which men qualified and about to go out into the world give when they tell you that “It’s jolly hard to have to leave the old place.” Once again we bid you welcome, and hope that your student days will be days of good work and much happiness; that the fund of experience which you will acquire will develop your sense of sympathy and justice, and that when the time comes for you to leave, you will ever think of your Hospital with that love which characterises all old Guy’s men.

# MBBS: What We Wish We Knew In First Year...

Noor Amir Khan, Jana Mohamed, Siani Senthil Kumar, Denise Agudilla and other contributors.

Dear Freshers,

Well done for getting into medical school and welcome to GKT! Getting here is a huge achievement on your part - you should be extremely proud of yourselves!

Having just completed First Year, we thought it would be beneficial to impart what we have learned with you. You will be exposed to a lot of varying guidance throughout the year and this can be overwhelming. Remember that everyone thinks in different ways; what works for someone else may not work for you. Be ready to make mistakes and adapt your techniques as you progress.

# What we wish we knew...



## Have a work-life balance

• First year is ultimately trial and error so don't stress if it takes you a while to establish a work-life balance. Go to as many society events as you can, pick up a new sport, go out with your friends, speak to different people, explore London... Honestly just make the most out of it!

**Jana Mohamed**

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“honestly just make the most out of it!”

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• Definitely join a society or sports team! It was the best decision I ever made joining KCL Lions Cheerleading at Kings as a complete beginner. It's a nice way to keep busy when I'm not studying for my degree.

**Denise Agudilla**

• Keep in mind that, as medical students (and hopefully doctors) we have to study for the rest of our lives – so try your best to start developing healthy boundaries from now. Achieving a work-life balance is very challenging but you need to develop the trust within yourself that you will be able to complete the work without studying 24/7. Making yourself open to solely studying all the time is a colossal mistake as work expands to fill the time you give it.

**Noor Amir Khan**

• Surround yourself with like-minded students. You can complete individual tasks together or work collaboratively – quizzing each other on the lecture slides, doing questions or explaining difficult topics to each other really helps, especially in exam season.

**Jana Mohamed**

• Don't overcomplicate your studying process in the pursuit of the 'perfect' study system. Maximising efficiency isn't always helpful and can become an immense stressor and time-waster. You don't need the most up to date technology, apps, study techniques, note-taking software etc. They have advantages but, ultimately, they are just tools. What's more important is how you use what is available to you.

**Noor Amir Khan**

• Aim for the highest you can but shift your focus from the end result to trying your best and making the most of the process. Getting 100% or the top percentile is not necessary, you just need to pass!

**Noor Amir Khan**

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“you will be able to complete the work without studying 24/7”

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• Everyone works at a different pace and with different study methods so try your best to focus on your own progress. If writing notes or making Anki flashcards doesn't work for you, move on to a different technique.

**Jana Mohamed**

• If your lectures build up, please realise that this is very common and experienced by virtually everyone!

**Noor Amir Khan**

# What we wish we knew...



## Work Smart Not (Just) Hard

• Consider using the dissections, tutorials and workshops as deadlines to have covered the respective lectures. Even if you haven't watched the lecture, make sure to still attend and just skim through the slides beforehand. By seeing everything in your course at least once, it relieves a lot of the pressure at the end of the year and decreases the chance that you need to cram.

**Siani Senthil Kumar**

• Understanding the content directly from the slides is more important than spending time creating resources for every lecture or memorising word-for-word. Even if it takes you a long time to understand something, if you can explain it to someone else, that's a good sign!

**Noor Amir Khan**

• When you come out of a lecture ask yourself, 'What were the main ideas presented by the lecturer? How do they fit into the big picture?' Some lectures are more important than others but always consider the main takeaways rather than the nitty-gritty details.

**Noor Amir Khan**

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**“consider the main takeaways rather than the nitty-gritty details”**

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• Doing practice questions is critical – you don't necessarily need to learn all the content before doing them as you can learn the content through doing the questions themselves. Make sure that you can explain why the answer given is correct but, also, why the other answer options are incorrect.

**Noor Amir Khan**

• One way of doing this is taking part in the TeachMed Quiz Bank - a collaborative question bank tailored to our course.

**Jana Mohamed**

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In the end, First Year won't be perfect. Regardless of the advice you receive, you will make mistakes - and that's okay. Adjusting to university is an enormous lifestyle change but, from another perspective, a fresh start! So try your best to make the most of it and have fun.

We hope that you find our advice helpful, feel free to take on what you need for the start of your medical school journey.

Yours sincerely,  
**The Year Above!**

SOCIETY OF  
THE YEAR  
The GKT Gazette

GKT Gazette, Society of  
the Year, 2022-2023

SOCIETY OF  
THE YEAR  
The GKT Gaze





# Social Media and Healthcare: Insightful or Frightening?

Charlotte Mulcahy **MBBS4**

Since its conception, the utility of social media versus its potential consequences has been a contentious topic. There are three main social media platforms in which healthcare professionals discuss medical news, politics, and their personal experiences.

Perhaps the most predominant, #MedTwitter, is an online community of doctors and medical students who discuss anything from interesting cases to junior doctor retention in the NHS. On the other hand, Med Instagram (although it doesn't seem to have a specified name) consists of medical student influencers and junior doctors posting sponsored content. Finally, there's the Reddit wormhole; this forum site is home to the junior doctors subreddit, a mega-thread containing updates to training programmes, admin horror stories from FY1s, and lists of trusts that still use paper notes.

These social media platforms can provide insight and solace to people currently in the healthcare system, or about to enter it. However, could they be reinforcing negative experiences in the medical community, and scaring off prospective students?

MedTwitter probably interacts with the public and Allied Health Professionals (AHPs) more than any other platform. Twitter has been instrumental in the creation of viral tweets that reference the recent strikes, with many doctors publishing their pay checks to prove to the wider public that they're really earning £14 per hour. Much of the original pay restoration sentiment came from junior doctors with large followings who shared their stories on Twitter, and henceforth has been a powerful tool for rallying junior doctors during the strikes.

However, since this platform is the most viewed by the public, there are frequent interactions with AHPs who complain of unfair generalisations and criticism of their professions by doctors. A lot of the debates that occur on Twitter may be furthering the divisions within the medical and healthcare professions, rather than creating a sense of community. These online conversations go unregulated and unmediated as everyone is able to state their opinions on the utility of various members of their team, usually without a meaningful resolution.

Amongst doctors themselves there is disagreement. The popular account '@Doctors\_Vote', who championed the BMA (British Medical Association) ballot for strikes, has been publicly called out on Twitter for publishing new strike dates prior to official announcements from the BMA.

The lack of positive stories from working in the NHS and huge abundance of pessimistic anecdotes shared via social media has led medical students to express feelings of dread towards beginning a career in the NHS. Although students should have an accurate idea of what their future job will entail, is it possible that over-exposure to negative stories online may be driving them away?

In contrast, MedInstagram is a different, much shinier story. Instagram, and consequently the Reels shared on this platform (short form videos), tend to show the more glamourised lifestyle of being a medical student. The audience and content creators appear much younger and tend to curate posts with snapshots of anatomy textbooks, pink scrubs, stethoscopes, paid-for question bank services, and late nights in the library.



Although this is not a wholly inaccurate representation of medical student life, this picture is definitely more encouraging to prospective medical students. However, this picture of medicine may also be damaging and fuelling the phenomenon that many young people have felt, where they feel their life may not be matching up to others' that they see online. Posts from medical professionals tend to lean towards informative public health type content, or educational single-best answer questions and explanations aimed at current medical students. Although some medical school influencers do try to provide a balanced perspective on studying medicine, perhaps due to Instagram's more 'fake' nature, the content is a little more upbeat.

The medical student Reddit follows a similar vein to The Student Room (a forum website for prospective university students) and provides advice to and from current students. The junior doctor subreddit is where it gets a little messy. The thread, created in 2017, boasts over 40,000 doctors and rarely goes without a post for more than a few hours.

Perhaps due to administrative issues in the NHS, it has become the go to place for junior doctors to ask for information regarding their rights, pay disputes and other elements of NHS bureaucracy. It's also packed full of information on how to leave the NHS and move into other sectors, or abroad. Some threads name-and-shame (or badly anonymise) consultants or NHS management in various trusts and expose them for their mistreatment of junior doctors. Others will then often add jokes, opinions, defences or in some cases 'insider knowledge' to the threads. Reddit may be the compromise between the doom and gloom of Twitter, and

the artificial glossy aspect of Instagram.

Reddit has not gone unnoticed by others, with a recent Times article claiming that the strikes are a result of organisation and campaigning that occurred on the Junior Doctors subreddit. The article details how BMA members who now hold council seats strategized for their elections and the subsequent vote for strike action.

The ultimate question is whether any of these platforms are truly useful... Do they harbour more dislike and frustration of the profession? Do they allow junior doctors to speak freely and seek information? Do any of these platforms truly represent what it's like to study and work within the NHS? Although social media may appear more democratic than traditional mainstream media, as everyone and anyone is able to tell their stories without a narrative. However, the 'echo chamber' effect could be preventing access to the wider public. For example, those who work for the NHS and engage with social media content from junior doctors are more likely to see their posts sharing their payslips and explaining the demands for full pay restoration. On the downside, much of the wider public are unlikely to see these unpolished accounts and will only be consuming the newspapers' accounts of the junior doctor strikes. This means that, with the exception to the occasional viral post, junior doctors are essentially 'preaching to the choir' and reinforcing the negativity and pessimism towards their jobs.

One thing's for certain: Whilst people remain interested to become UK Doctors, the information on these platforms will continue to be sought out by many. Though social media may have originally been intended as an organic way to share information away from mainstream media, over time this has become diluted. Today, it's possible that it may be worsening problems within the NHS, or perhaps even creating new ones.



# Studying Medicine: An Inherited Trait?

Jade Bruce **MBBS4**

## ‘Are your parents doctors?’

Most medical students will be familiar with this question. It is discussed among peers and with qualified clinicians. What may be intended as innocent curiosity or a conversation icebreaker, implicitly reflects the common assumption that medicine, or at least healthcare, runs in the family. Arguably, this is not an unreasonable assumption to make when a lineage of medicine can often be traced through the families of medical students.

A large Swedish retrospective observational study concluded that one in five Swedish doctors had a parent who was also a doctor, a proportion that has tripled over the past 30 years (Polyakova, 2020). According to the book *The Class Ceiling: Why it pays to be privileged*, children of doctors are 24 times more likely than their peers to become doctors (Laurison, 2019). But does it really matter?

Medicine is not the only career that runs in families, other professions such as law, performing arts and farming are frequently ‘passed on’ to children. However, medicine is among the most inherited occupations, indeed the Swedish study found that the same heritability was not seen in those with law degrees (Polyakova, 2020). Regardless, the inheritance of medicine demands scrutiny, independent of trends in other careers.

Exposure is the most intuitive explanation for the prevalence of doctor families: When young children are surrounded by dramatic work anecdotes and medical jargon from a young age, this exerts an inevitable influence. Some students may feel that studying medicine was pre-destined or expected from them, due to overt or covert pressure. As Adam Kay comments in *This is going to hurt*, ‘... my dad was a doctor. It was written on the walls [that he would study medicine]’ (Kay, 2017). Others share that their medical parents tried to dissuade them from a challenging career in medicine, only to pursue it irrespectively.

That said, it would be short-sighted to attribute the existence of medical families to exposure alone. Globally, medicine is long established as one of the most elite and prestigious careers, associated with wealth and privilege. Though widening participation initiatives aim to dismantle the socio-economic barriers to studying medicine, elitism remains pervasive and intersectional. In 2016, the Social Mobility Commission found that only 4% of UK doctors were from working-class backgrounds, lower than other careers like law (6%) and journalism (11%) which are also associated with privilege (Social mobility commission, 2016).

On a practical level, having a doctor for a parent provides insight, connections and work experience opportunities. But more than this, it may represent the wealth and high socio-eco-





conomic position that has long been analogous with the medical profession, though this is gradually changing. Medicine is a long and expensive course to study, particularly in London; the socio-economic barriers are clear... perhaps less apparent are the cultural barriers.

When a student observes their family, wider circle or people they identify with pursuing medicine, it is more likely to feel an achievable career prospect. Their family, friends and school may be better equipped to guide them through the complex admissions processes and provide insight into life as a doctor. Once at medical school, there may be a greater feeling of belonging and sense of community. For those who have no contact with the medical world, the possibility of studying medicine may feel distant, irrespective of ability or eligibility for widening participation schemes.

The most recent UK A-Level results (2023) showed that private school students were more than twice as likely to receive A/A\* grades, when compared to state school students (Toby Helm, 2023). It follows that our medical schools are dominated by those afforded an elite education: In the UK, ~61% of medical students went to private school, despite only 7% of the population receiving a private education (Social mobility commission). These disparities reflect the undeniable inequalities that are entrenched throughout our education system.

Few dispute the importance of an equal and diverse workforce, one which represents the patients we care for. The government and NHS Long Term Plan claims to acknowledge this, yet for a complex host of reasons diversity remains

poor within the NHS and medical schools (NHS, 2019). Widening participation initiatives are valuable, but they must not distract from the system-wide barriers to studying medicine that cut deep through our society.

It seems that, as is the case for many social problems, the root cause of unequal access to medical education circles back to pervading systemic issues and cultural barriers. While for some medicine is a familial default, for many, medicine is not even a consideration.

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# An Impersonal History of Industrial Action in the NHS

Arnav Umranikar **MBBS3**

## The Founding

I have chosen not to focus on every instance of industrial action in the NHS, for example I have omitted discussion of the 1974 Nurses' Strike, or the 'Winter of Discontent' strikes of 1979. This is not to diminish the significance of these events whatsoever, but to keep the narrative focussed.

May – July 1945: Second World War in Europe ends. Attlee's Labour government elected to power. Aneurin Bevan becomes Minister of Health. "Through many years of adversity we have kept our faith, we have striven for the opportunity to translate our Socialist policy into action. That opportunity has now come to us in full measure. We have, I believe, made a good beginning. We shall not falter. With faith in the justice of our cause and our ability to serve the nation we confidently face the future." – Clement Attlee

July 1948: Bevan's signature policy, the National Health Service Act 1946, came into effect. Doctors, represented by the British Medical Association (BMA), were not keen by the prospect of being subject to the "Tito of Tonypandy". The BMA relented when concessions, regarding private practice, to doctors were offered. 'On 5th July we start together, the new National Health Service. It has not had an altogether trouble-free gestation!' – Aneurin Bevan

## The 1970s

1971: Fewer than 3,000 NHS staff had been involved in any form of industrial action since the organisation's founding; it was a very rare occurrence.

1972: Ancillary staff in the NHS had seen their pay eroded in line with inflation but were essential to the running of hospital (cooks, cleaners,

porters etc.). They were some of the most poorly paid workers in the country and did not receive the respect they deserved. Meanwhile, the NHS was 'a sort of dictatorship of the doctors', with the Department for Employment warning that 'the service has for a long time been able to get by on the goodwill of its employees.'

1973: The National Union for Public Employment (NUPE) organised a strike for ancillary workers. 97,000 workers undertook industrial action in the form of 'working to rule' (doing the minimum level of work, as required by the terms of their employment). This lasted for 6 weeks, affecting 300 hospitals, proving the importance of these workers to the functioning of the organisation. "The strike itself was no great victory, but it changed the way workers felt. At the end of the strike... The cleaner who hadn't had a mop in three years got one. The porters got a fridge in their restroom. Now, nobody could be fired out of hand because their face didn't fit." – Jonathan Neale, hospital porter and steward of NUPE

1975: Consultants went on strike in response to plans, they perceived, that would prevent them from practicing privately. This would be in violation of the outcome of the 1948 negotiations between Bevan and the BMA. Consultants suspended 'goodwill' activities and worked-to-rule for 6 months and achieved their goal to retain private practice. Senior doctors remained powerful stakeholders in the NHS.

Later that year, their junior colleagues went on strike to contest plans that would see their overtime pay being cut by two thirds; thus, their overall pay would reduce by a third. Junior doctors, who were accustomed to working 85-hour weeks, undertook industrial action by working to 40-hour weeks, and only carrying out emergency work. Proposals for overtime pay

## The Modern Day

June 2012: Doctors took strike action in response to proposed changes to pension schemes. The 24-hour strike was undertaken by 8% of the country's doctors. Only urgent and emergency care was provided, with 2,700 elective and 18,750 outpatient appointments cancelled.

January – April 2016: Junior doctors took strike action in rejection of a revised working contract devised by Conservative Health Secretary Jeremy Hunt. The new contract would reduce the number of hours considered 'unsociable', and therefore reduce potential overtime pay, which could form a significant portion of one's salary. Changes to graded pay increases were also contested. A revised contract was eventually agreed in June 2019, after 4 years of bitter negotiations.

March 2020: World Health Organization declares the SARS-Cov-2 outbreak a pandemic. The economic bounce back creates a rapid rise in inflation.

February 2022: Russia invades Ukraine. This event continues to accelerate the steep rate in inflation.

October 2022 – February 2023: Royal College of Nursing (RCN) endorsed strike action by its members, in response to a dispute with the government over insufficient pay rises. Ambulance staff, represented by the GMB Trade Union, agreed to undertake strike action for similar reasons.

February 2023 –?: Junior doctors and consultants, represented by the BMA, agreed to undertake strike action on several dates in the spring and summer of 2023. Negotiations with Conservative Health Secretary Steve Barclay, centred on pay increases, have been in a deadlock. Public opinion is overwhelmingly in support of the doctors.

Due to page constraints, references can be requested directly at [gktgazette@kcl.ac.uk](mailto:gktgazette@kcl.ac.uk)



Photos sourced from the Wellcome Collection



# A Conversation with Dr David Parry: Anatomy, Curriculum Design, Diversity and Individualism

Arnav Umranikar **MBBS3**

Dr David Parry is a senior anatomy educator at King's College London and the Royal College of Surgeons, where he is also an examiner, as well as being a former clinician before embarking upon an academic career. He kindly agreed to speak to us in July 2023.

Consider Professor Harold Ellis' words, written in 2013; '[The importance of anatomy] was true over 50 years ago when I wrote the first edition of [Clinical Anatomy], and is perhaps even more so today, when anatomy in the medical student's curriculum has been greatly reduced.' The setting for a conversation with Dr David Parry could not be more fitting; sitting in Professor Ellis' former office, a few stories above the Upper Dissecting Room, with a resplendent panorama of London unfolding from our eyes.

The ferocious rate of scientific progress has inevitably impacted the nuts and bolts of being a doctor, even in this century alone. Such is the perennial problem of designing a curriculum that can create doctors who are intellectually resilient enough to not only withstand change, but indeed embrace it; for the sake of patients and society. This is a day and age where communication skills are a core part of the curriculum, and when coding and entrepreneurship are being touted to join it. Change is not to be feared per se; 'This is not a new phenomenon; curricula change all the time. New things come in, and sometimes they go; that's true in medical schools across the world. You do have to look at what you do periodically and ask yourself whether it's appropriate; in every aspect of life. Is what we've been doing relevant, or should we be doing something else? But to introduce new topics into an already fast-paced, packed curric-



doctor. Asides from the biomedical and clinical aspects of medicine, this is perhaps why we have a student selected component, teaching of the humanities, and tastes of research and medical education. Whether or not this is optimal is not for just one person to say, nor can that be discerned without patience. But one's education is a profoundly important aspect to one's life, and it can be disquieting to feel like a guinea pig in a set of curriculum changes. Especially when you're paying for the privilege with your time, money, and attention. Who knows what may work and what not? The results will show long into the future. But perhaps perspective is the antidote; 'Anybody under trial is suffering for the mistakes of that trial. But the older you get, the more you realise that this has been around before. Things change and evolve, they always have; it's always in flux. Even if something is not a great idea, it gets gradually lost. I don't think that should stop people trying things.'

Segueing more towards macro-level changes (hypothetical and not specific to our medical school), our discussion turned towards medical apprenticeships and shortening the core course from five to four years. On apprenticeships; 'you would need a group of people involved in the development to that person; there are very few people who can provide that by themselves'. But whilst the idea of a medical apprenticeship is good in theory, and considering Dr Parry's view, this would surely demand a greater level of supervision than in the current iteration of medical schools. 'Look at the numbers we handle. There were 90 in my year at King's [prior to the merger with UMDS in 1998]. Now there are 400 to 500. It was much more personal. People in the faculty still want to provide that, but they just can't do it at this scale, and it's frustrating.' It's clear that we've crossed the Rubicon regarding this matter. Two mergers have taken place, combining three historic medical schools. A de-merger process would be theoretically and practically unthinkable. This is to say nothing of the sheer demand for doctors in the current climate of the NHS. 'We're not short

of doctors by a little bit, it's to the point where care can't be provided. The only way of doing that is to get more doctors through.' This is why shortening the course has been touted in the first place. How does this affect the balance between quality and quantity? 'It favours quantity, but the state of the NHS is one of the major political tools for the people at the top of government. It is short-termism for them because they are only looking to win the next election. We live in an imperfect world.' It's a price we pay for democracy, and almost certainly one worth paying.

Dr Parry told me that in vacating his office, Professor Ellis left him a whole cupboard worth of books. Knowing Dr Parry, I somehow assumed that Arnold Schwarzenegger's Encyclopaedia of Bodybuilding was not one of the books he inherited. A man who is a powerlifter, master diver, helicopter pilot and clay pigeon shooter in his free time, he is certainly qualified to talk about pursuing one's interests. Doing so is very important, and can be the pursuit of anything, according to him. Doing a sport, playing an instrument, or just going to the pub. To each their own, is his philosophy. 'We should encourage individuality. In fact, the best way to encourage diversity, is letting people be individuals.' I hope this succinct, yet profound statement resonates with you as much as it does with me, and the following is my interpretation of it. In a world where virtue is contingent on your combination on the slot machine of skin colour, sex, sexuality, and gender. People are infinitely more interesting because of what they do, not who they are. I'm not saying that these material characteristics are irrelevant, but they are, in my view, not as interesting as one's hobbies and interests, for these mould one's models of thinking. For all the talk about diversity, in this university and far beyond, the only truly important form of it is that of thought. Dr David Parry is the embodiment of this.

*I thank Dr David Parry very much for taking the time to speak with me and imparting his wisdom and insight onto these pages.*



# Thomas Guy Sub Aqua Club: U-Boat Detectives

Jacob Mackenzie



Photos provided by Jacob Mackenzie



**Not a bad tag line for one of the UK's few hospital-based scuba diving clubs, though we can also add 'as seen on the BBC and Disney Plus'.**

Few people know that Guy's Hospital has a swimming pool. Even fewer know that it has a diving club. The Thomas Guy Sub Aqua Club (TGSAC) has been training and diving from its secret underground headquarters in the Guys Hospital's swimming pool for 37 years. Deliberately low-key to reduce costs for NHS colleagues and associates, the club has enough equipment to get people started on, or to continue along, their pathway to becoming the aforementioned U-boat Detectives. Frequent day or weekend UK trips and recreational club holidays are also arranged.


I have swum at Guy's for years, and in 2006 took the plunge with TGSAC. It has been downhill for me ever since, but uphill for TGSAC, which has grown in size, diversity and enthusiasm and set new records for appearances in *Scuba Magazine* (me) and the *Daily Star* (ahem, me). We have remote bases in Weymouth and Orkney, and club trips around the UK are a regular occurrence. We have dived in more countries than I can fit in this word count, and there is genuinely something for everyone to enjoy.

TGSAC, like any regular diving club, is a gateway into a much wider hobby. Additional

training and experience outside the club are encouraged, and can lead to firm friendships and the planning of multinational expeditions, such as the discovery of the missing submarine UC55 off Shetland. Diving is nothing without teamwork, even for a TGSAC weekend outing to Weymouth or our recent week in Ireland for example, and the UC55 was similarly the culmination of shared efforts.

The UC55 was a German UCII type minelaying U-boat from World War I. She sank off Shetland in September 1917 after three Royal Navy patrol ships caught her on the surface. Riddled with gunfire, she sank with the loss of 10 crew and 17 more taken prisoner.

In theory, the location was known from contemporary witnesses. Finding the wreck was, however, harder. X rarely marks the spot, as original logs will all give different locations based on dead reckoning. More generally, seabed surveys over the decades have identified thousands of objects and likely shipwrecks on the seafloor, and the location of these is tentatively marked on paper charts and electronic resources, with inevitable transcription errors from pre-GPS navigation systems and changes in geodetic datum standards. Better information can sometimes come from fishermen in the pub reporting seabed hazards, or from finding forgotten records back in the archives. The final search needed all of this, followed by sonar sweeps to find the most likely target in the general vicinity,



### Fancy a game of minesweeper?

and ultimately a dive to confirm the wreck's identity.

This is where divers come in. The UC55 sank in 105m of water some 600 miles due north of us here at GKT. Remember what I said about pursuing additional training and experience?


For budding physiologists, deep diving is fascinating. Many people do a basic diving ticket, either in UK or on an overseas holiday. Some people keep it up regularly in a UK based club. A handful move to seriously deep diving. A tiny number then consider doing 100m type dives in the real world on a regular basis. A dive to 105m means a three-hour runtime, and you must be happy doing it alone – because if you get separated after the first 30 minutes you are going to be on your own for the next 150 minutes anyway.

Deep diving has many risks, including, but not limited to, decompression, inert gas narcosis, oxygen toxicity, carbon dioxide poisoning,

breathing gas density and thermal regulation. In other words plenty to consider while planning your own dive and helium breathing gas mixtures. Add in individual and team contingency planning and emergency procedures and you have quite a bit of logistics to arrange.

The diver has the easy job – just make a plan, jump in and swim down. And obviously come back up again, following a decompression schedule. Finding the wreck, accurately dropping in the shotline, deploying the trapeze, managing the dive deck and recovering the divers are the tricky bits. Luckily we had the right researchers and the dive boat MV Valhalla, one of only a few UK boats geared up for that kind of expedition, and very good friends of TGSAC.

So what did I see? I was first person to see the UC55 since it sank in 1917, which carries a sense of responsibility. My first view was a pile of fishing net, which I wondered might be the sonar target, but then saw the submarine looming eerily out of the pitch darkness. She



Open foredeck hatch





Torpedo, open deck hatch and 88mm deck gun

was upright and in excellent condition given the circumstances. Hatches were still open from where the crew had scrambled clear, or not as the case may be. Rows of mines with their detonator prongs were visible along the foredeck next to a spare torpedo. Everything in the original photos and plans was still there.

Years of work and experience culminating in three hours underwater in a disciplined team and a missing U-boat identified – a very satisfying outcome. The Shetland Times picked it up, then local BBC radio, then the BBC news website, where we reached fifth most viewed story, and then I was recording a TV interview at work (don't tell Corporate Comms).

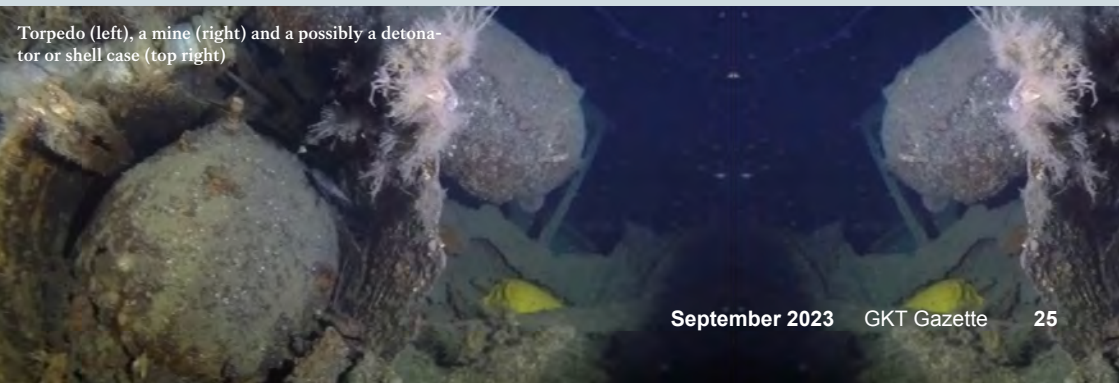
And Disney Plus? Well that is another story, but it all started in Guy's pool on a Wednesday evening.



SM UC55 (credit – lost in waters deep)



I'll just stare at this for another 76 minutes



Torpedo (left), a mine (right) and a possibly a detonator or shell case (top right)



# Blue Plaques

Arnav Umranikar **MBBS3**

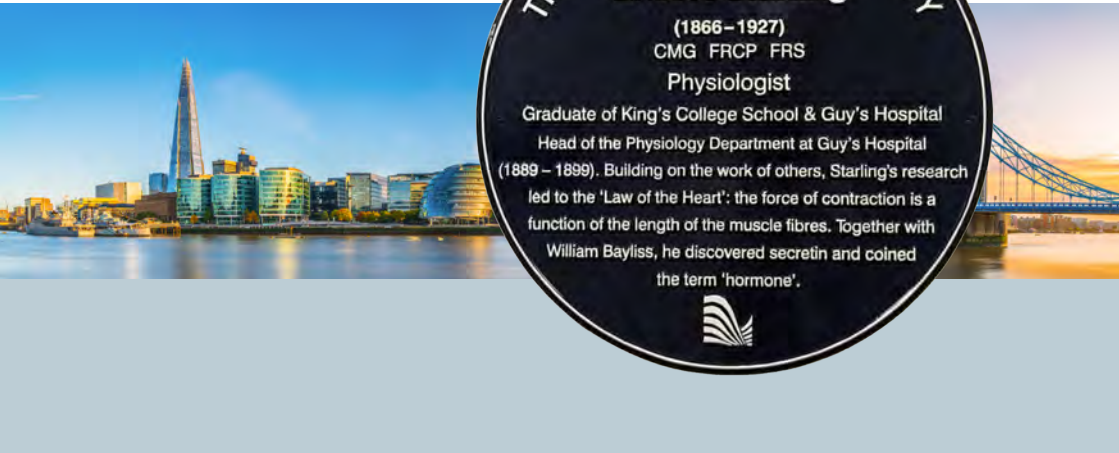
A couple of years ago in May of 2021, I was dilly-dallying between options for an important choice. Whether to spend the next five to six years wandering the graffiti-adorned streets of Bristol, or the rather more grand and rich ones of our capital. Suffice to say, I have no regrets. One is not just choosing a medical school, but a city and a home. And what better city is there than London?

For what other city has the historic and cultural firepower that this city does? To save labouring at an obvious point, I will point readers in the direction of Bloomsbury, Covent Garden and South Kensington. Bristol may have the Arnolfini Gallery, but it hasn't got the Arnolfini Portrait for which it's city gallery is named for.

Whilst the rich diversity of architecture in London must also be celebrated, it is something specific about its buildings that I would like to comment upon. The Blue Plaques, organised by English Heritage London, but also adopted by various councils, including Southwark, can be found on over 990 buildings across the city.

Small and inconspicuous though they may be, their subjects are anything but. They honour the great and good who have administered, invented, painted, philosophized, composed, and done a great deal of other things, in buildings of London. From the Freuds from Sigmund to Lucian, Bertrand Russell's apartment near Russell Square and both Ian and Alexander Fleming. We mustn't forget the plaques that bear the names of those associated with our fine medical school, including W. Somerset Maugham, Richard Bright and Thomas Hodgkin (the original pathological specimens that the latter two lend their names to are found in the Gordon Museum on Guy's Campus).


In many ways, our medical school and university is a microcosm of London itself. I wonder how many languages are spoken and nationalities are represented, but I'd wager that the community mirrors the city to a great extent. It is important and informative to honour the interesting, influential people who have graced our medical school, in the same way it is for the city. It should be a great source of pride for us to be



**THE PHYSIOLOGICAL SOCIETY**

**Ernest Starling**  
 (1866 – 1927)  
 CMG FRCP FRS  
 Physiologist

Graduate of King's College School & Guy's Hospital  
 Head of the Physiology Department at Guy's Hospital  
 (1889 – 1899). Building on the work of others, Starling's research led to the 'Law of the Heart': the force of contraction is a function of the length of the muscle fibres. Together with William Bayliss, he discovered secretin and coined the term 'hormone'.



able to talk about our alumni, knowing what we as individuals and as a community are capable of, a feeling that transcends time.

It therefore gives me great pleasure to see our very own plaques and monuments that celebrate those associated with the medical school. Keats is immortalised not only through his poems, but our online learning system as well as a statue. Ludwig Wittgenstein, the great Viennese philosopher, worked anonymously as a porter at Guy's in World War Two, allegedly because he would 'die slowly if left at Cambridge, and would rather die quickly'. One can find his plaque on the colonnade of Boland House. We must not also forget the monuments to those who have sacrificed their lives in war, their fight for what is right creating the world as we know it today.

A recent edition to this august ensemble has been a plaque commemorating the life and work of one Ernest Starling, organised by The Physiological Society. This titan of physiology lends his name not only to the law regarding the relationship between filling of the heart

and degree of contraction, but the forces which determine fluid movement in vessels. He can also be credited with coining the term 'hormone', and therefore is considered the father of the discipline of endocrinology, not to mention being a vociferous proponent of the teaching of physiology in medical education (which did not occur in the United Kingdom prior to the First World War).

We must continue these displays of living history. It makes the presence of those distinguished people feel tangible to us. What interests me more than just the individuals, however, is the values that they represent; knowledge, curiosity, rigour, abstraction, courage, liberty; characteristics which embody the very ideal of the university. The point of being student is not just to get a degree. Displaying individuals that embody these values should make us reflect about what we, on the collective and individual levels, want to emulate.



# A Lifetime Of Pathological Chance And Opportunity

**Sebastian Lucas** was appointed Professor of Clinical Histopathology at United Medical & Dental Schools of Guy's & St Thomas' in 1995. He semi-retired in 2012, fully in 2022, but continues teaching pathology to remind everyone of its importance in modern Medicine.

1995 was not my first posting to what became GKT medical schools, since I had spent two years (1979 and 1982) in the Dept of Morbid Anatomy/Histopathology at St Thomas' Hospital. All good careers are built on Chance and Opportunity: mine came in 1976 from a rectal biopsy from a pregnant woman, spot-diagnosing what turned out to be fatal colonic amoebiasis. Seeking more knowledge about the pathology of uncommon infectious diseases, I found Professor Michael Hutt in his Wellcome Trust-funded 'Tropical Pathology Unit' [TPU] at St Thomas'. He took me on to be – I later discovered – his successor as the UK expert in tropical and infectious disease pathology, and my whole life changed.

Mike sent me (plus young family) to get two years' experience working in Africa, in Nairobi, Kenya – not the first choice, since I would have gone to his old workplace in Kampala, Uganda, had there not been a civil war in that country at the time. Once one has worked in a country with limited medical resources yet huge demand for care, one views rich countries' national health services very differently – with more circumspection. The other lesson I learned was that if one wants to know what really goes on in a country, work in the largest mortuary there.

Back in the 1970s and 1980s, the TPU received, by air mail, much diagnostic tissue samples from mission and teaching hospitals across east and central Africa – there being few working laboratories that could provide a local service – and sent the biopsy reports back by airmail (no emails or fax then!). When I took this Africa work with me back to UCH pathology in 1983, one of the emerging diseases in Uganda that was increasingly causing concern was 'slim disease', one syndrome of what became known as HIV/AIDS. With Ugandan colleagues we wrote a pathological description of the gut opportunistic infections that led to the patients wasting away and dying.

This experience, plus my participation at the autopsy of Terrence Higgins (one of the earliest deaths from AIDS in UK) at STH in 1982, pushed me into the clinical pathology of HIV disease – chance and opportunity again, since few other pathologists seemed interested (ie not frightened) by this then uniformly fatal infectious disease, whose potential for global social and health care disruption was only beginning to be appreciated.

1986 brought another unexpected opportunity. LEPRA (the British leprosy charity) needed a new pathologist to report on the large number of



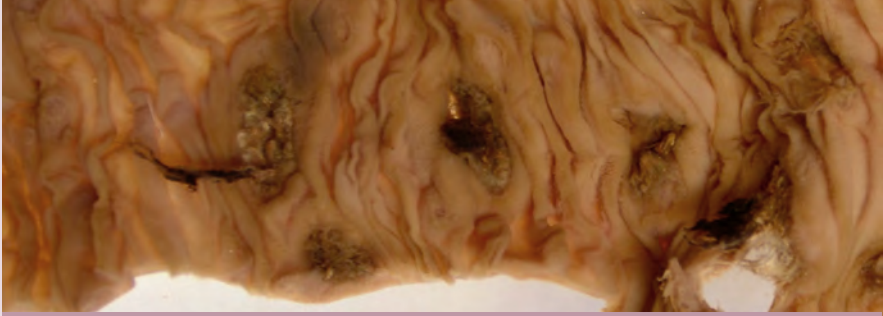
skin biopsies generated by their project studying the epidemiology of leprosy in Malawi; and a microbiologist from Karachi, Pakistan, arrived at my office to ask if I would do the diagnostic pathology for their research projects on leprosy in that country. How can one refuse? One learns by doing, from experience and self-correction through feed-back; so seeing about 3 leprosy biopsy samples every day made me an expert on that disease pathology in short order. The diagnostic service expanded to encompass samples sent from leprosia in India, Nepal, Nigeria, Liberia and northern Australia (sic). It also meant that I could examine the much fewer samples from leprosy patients in UK rather better, in conjunction with the London Hospital for Tropical Diseases (another pathology position that I had assumed). That overseas leprosy work ceased when I came to GKT in 1995, because the Malawi project was so successful that endemic leprosy was effectively eradicated there, and also LEPROA had financial problems and so cut their support for me and histopathology.

Whilst at UCH between 1983-1995, HIV/AIDS took over more and more time. The Middlesex Hospital had developed the first special ward service (Broderip Ward) for that disease, and because there was no effective treatment for HIV

– that did not commence until after 1996 – there were lots of deaths, almost all among gay men.

The clinicians were extremely interested in what was happening to their patients and so the autopsy rate from their deaths was high, as was the biopsy rate from the living patients. Another learning experience: doing one to four AIDS autopsies a week necessitated the refurbishment of a small disused mortuary at St Pancras Hospital, and provided a wealth of pathological insight into this horrible disease. It would not have been possible without the assistance of an excellent mortuary technician who was not fazed by the (very low) risk of catching HIV and who was more than keen to contribute to the examinations. Many of the autopsies were subsequently published in a sexually-transmitted disease journal as educational clinico-pathological conferences.

Meanwhile, HIV was wreaking havoc across sub-Saharan Africa, and a second virus – HIV-2 – had been discovered in West Africa. The USA Centers for Disease Control [CDC] built a research unit in Abidjan, Cote d'Ivoire, to investigate this new potential global threat, alongside the epidemiology and clinical aspects of HIV-1 infection in that country. This project was led by a medical friend from Kenya days, who invited me out to see what they were doing. He asked



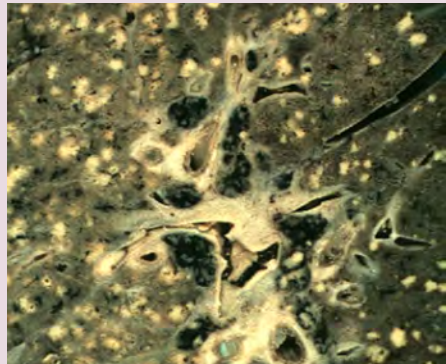
35-year-old male – multifocal small bowel lymphoma – from duodenum to terminal ileum with more than 30 tumour nodules in the bowel wall. These were 1-3 cm in diameter, mostly umbilicated and ulcerated. Several had also perforated.



31-year-old male – multiple haemorrhages in the colonic mucosa, due to shock.



Hand of a leper, exhibiting destruction of the terminal portions of the fingers. The ends of the digits are bulbous, and the skin covering them is intact.



Miliary tuberculosis in the lung of a patient with advanced HIV disease.

me to review a set of autopsy histologies, derived from HIV+ and HIV-ve patients who had died on the Respiratory Disease ward in the nearby hospital. They were actually consecutive deaths over a month: how could one examine consecutive deaths, surely it is not possible to autopsy so many people by obtaining consent from the relatives?

Napoleonic Law applied still (this is 1991) in Cote d'Ivoire, previously a French colony. Any one who died in, or was brought in dead to, the main hospitals could be autopsied without consent from relatives. The opportunity was obvious: to describe what HIV was doing to a population – and it was still very unclear what HIV was doing across Africa in terms of specific associated fatal diseases – by examining a random cross section of all those who died with HIV. Previously, all such population studies depended on autopsy consent, and so were smaller and not epidemiological.

1990 was spent – with Mike Hutt's encouragement - lobbying to grant-givers, raising money to send me plus my own technician and a year's worth of pathology laboratory consumables to Abidjan. The Ivorian Ministry of Health was whole-heartedly supportive of the project, as in the end were the British Medical Research Council, the Wellcome Trust, the WHO, and the CDC. We arrived in January 1991 and started the mortuary work two weeks later.

Within 3 months, it was evident what we collectively had been missing since the start of the HIV pandemic: the most important disease that kills HIV-infected Africans – and by implication, with later confirmation, people in other low-income countries such as India – is tuberculosis. Disseminated tuberculosis in the immunosuppressed is a fulminant condition, yet often difficult to diagnosis in life since it does not result in tubercle bacilli in sputum samples: it is occult, presenting as body wasting, diarrhoea and non-specific fever. It is also the main cause of the slim disease syndrome in HIV, and something we did not pick up from just looking at gut biopsy samples earlier. You need to have the whole body to examine.

Later large scale HIV/tuberculosis research and prevention programs in countries such as South Africa have reinforced this message.

Effective anti-HIV medication [ART – combination multi-drug anti-retroviral therapy] started after 1996, and the clinical pathology of this infection changed, with many opportunistic infections seen less often. This, the greatest medical advance in my lifetime, has transformed lives, with most people who are treated from early in the course of HIV infection (it is not curable) living nearly normal lifetimes with, hopefully, no HIV-related illnesses. Inevitably, all powerful medicines can have powerful adverse side effects. Continuing monitoring of this disease through the pathology seen in biopsies from the living and from autopsies has revealed many unexpected new syndromes. Two such stand out in my experience. After starting ART, the immune system partially recovers, leading to excess inflammatory reactions to certain pathogens present in the body. This is the immune reconstitution inflammatory syndrome [IRIS], and is particularly severe with tuberculosis and cryptococcosis – but controllable with steroids and changes to ART regimes, as the new cadre of HIV specialist physicians know. Another consequence is the development, under various circumstances, of a florid encephalitis, cerebral swelling, associated dementia syndromes and death – known as CD8 encephalitis from the characteristic monomorphic white matter infiltration by CD8+ T-cells. Again, once this syndrome was clarified and clinically recognised in its early stages, steroid treatment aborts it usually, and the patients live on.

The work on HIV pathology was the main reason I succeeded to the Chair in Pathology at UMDS in 1995. In the next part of this story, I will relate what happened next, spending the rest of my career at Guy's & St Thomas' Hospitals, and within KCL School of Medicine & King's College London GKT School of Medical Education.



# Hedley Atkins

*Portrait of Sir Hedley Atkins, kindly provided by Mr Bill Edwards of the Gordon Museum*

Dr Michael Lavelle

Sir Hedley Atkins was President of the Royal College of Surgeons, from 1966 to 1969, and President of the Royal Society of Medicine from 1971 to 1973. He was deeply entrenched in Guy's society, where he completed his clinical years as a medical student, and where spent his entire professional life (bar a stint with the Royal Army Medical Corps in the North African theatre in the Second World War) as a distinguished surgeon, eventually becoming Guy's Hospital's first Professor of Surgery.

I was first made aware of the existence of Sir Hedley Atkins when I was an undergraduate at Trinity College, Oxford. I had originally applied to read medicine at Guy's, but my A-levels were not good enough, and so Guy's had turned me down. I had stayed on into my third year in the sixth form, and got into Oxford by passing Oxford's own entrance examination. In those days, Oxford based all their admissions decisions on the entrance examination and the interview. After I had started at Trinity, I then re-applied to do the clinical course at Guy's and it was virtually unheard of to be turned down if one applied from an Oxford or Cambridge college. This meant that while I was at Trinity, I heard somehow that Sir Hedley had been at Trinity, and was now Professor of Surgery at Guy's, and that I would therefore probably come across him when I went there to do the clinical course.

When I was a student at Guy's, it was traditional to do three months as a "junior" student on a surgical firm (a so-called "junior dresser") near the beginning of the course, and then another three months as a "senior dresser" towards the end of the course, not long before the final exams. This system had the advantage that the firm had a mixture of junior and senior students, and the junior students learnt a lot from the senior students, who were usually very knowledgeable because they were preparing for

finals, as well as from the qualified teaching staff. I was a senior student on Sir Hedley's firm, and so I had to wait quite a long time, probably nearly two years, before I could ingratiate myself with him, by telling him that I was a Trinity man. I can remember doing this, and being very pleased that he seemed to be impressed with this fact. I felt that my sign-up for that firm was already much more likely to be an A than a B. In those days, we were given marks from A to C and 1 to 5 which reflected ability (ability to impress by happening to know the 73 causes of splenomegaly—hardly a week went by in my whole time as a clinical student at Guy's without being asked about this) and effort. At the end of the course, these marks were added up, and all the students were ranked according to the marks. The student with the top mark was given his first choice of house-job (the first appointment after qualifying), the next student down was given his first choice, if it was still available, and so on down the line.

I therefore spent 3 months as a senior dresser on Sir Hedley's firm, and during that period he was the President of the Royal College of Surgeons. I can remember the feeling of pride that Guy's had at that time, to have the President on its staff. In spite of Sir Hedley being so exalted, I always found him to be very courteous to all the staff around him. He certainly never behaved like the stereotypical surgeon. Both on the wards



and in the operating theatre, he was always quiet and polite, and he was very kind to the patients. There was one incident that I remember in the Out-Patients Department, however, when he seemed to be subjecting a patient to unnecessary indignity. For some extraordinary reason, whenever he did a digital rectal examination, he would make the patient kneel in the so-called “knee-chest position”, rather than have them lie in the left lateral position. Even we, as lowly medical students, seemed to know that this was not the way it was usually done. One day, he persuaded an old lady to kneel on the couch with her rear in the air, and as usual there was a semicircle of mildly interested students crammed into the cubicle. “I’m just going to do a PEE AHH”, said Sir Hedley in a booming voice. The patient, who was a bit deaf, but was one of those Guy’s patients who thought it was an honour to be a patient at Guy’s and was desperate to please, said “AAHH”, much to the amusement of the students, who luckily were gathered around her nether regions and couldn’t be seen by her.

As a surgeon, I don’t think Sir Hedley was particularly gifted, but at that time I was still a relatively inexperienced student, and had not yet had time to form an opinion about who was and who was not good with a scalpel. He certainly was not a rough surgeon, and in those days there were still a few of those around, even, though I shouldn’t really say it, at Guy’s. I remember him doing a mastectomy, and at the time he had a shoulder problem. It was obviously very painful for him to lift his left arm up onto the operating site, and he had to help it up with his right hand. As has been mentioned elsewhere, his main contribution to surgery was in the field of clinical trials and in particular the ethics of trials.

The highlight of the firm was towards the end of the three months, when he announced that he was going to show us around Down House, which had been Charles Darwin’s house for many years. At that time, the house was owned by the Royal College of Surgeons, and there was a flat in the upstairs part. Sir Hedley had moved into the flat in 1953 and had become the honorary curator. I may be wrong, but I think he may have continued living there after he ceased to be President. Some time before I



*Portrait by June Mendoza*

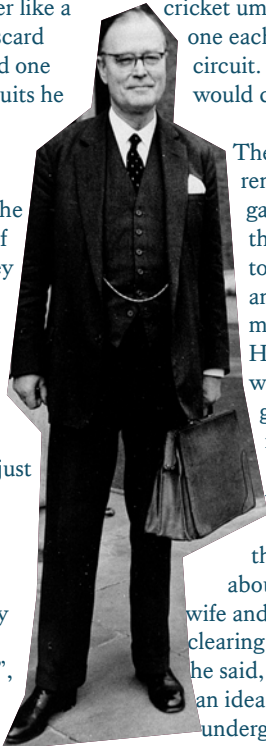
arrived on the firm, he had started a tradition of inviting all the students on his firm to visit the house. In those days, Down House was rather run down, and only had a few visitors a year, mainly people with a special interest in Darwin. During Sir Hedley’s stay there, the house and garden were gradually spruced up, and nowadays, under the ownership of the National Trust, there are thousands of visitors a year.

I can still remember the feeling of excitement one Thursday morning in spring-time when we all drove down to Kent. Some students had cars, and so we were able to cram in (no compulsory seat-belts then) and set off for the countryside. Having been living in London, I was always keen to get away, and had ambitions to live in the countryside eventually, so it was particularly pleasurable to be going out of London on a weekday morning. We may have gone in Richard Wright’s car. Richard was a fellow-student who had a car during his time at Guy’s. He was always extremely generous in giving us lifts. His car was a Morris 1100, I think, and virtually all the time while we were students there were two or three lengths of 2” by 1” wood in the back, just by the side of the nearside rear seat, so that one had to climb over them to get into the back. Richard was a keen amateur photographer and apparently these lengths of wood were to make into frames which would be used on which to mount very big enlarged photos.



However, I don't think he ever got around to using them and they stayed in the car virtually all the time that we were students. We arrived at the house and were welcomed by Sir Hedley, and it was immediately obvious that he was passionately interested in the house and its history with reference to Darwin. I often ask myself how it is that I remember so much of what I saw and heard that day all those years ago, and I wonder if it is something to do with the enthusiasm that Sir Hedley had for the place. He certainly seemed to transmit that enthusiasm to us all as he proudly showed us around. I think we started by being shown around the gardens. He described to us how Darwin did the same things each day, and at exactly the same time. We were shown the Sand Walk, which is a straight walk for, I think, about 100metres along the side of a row of trees, around the end of the row and back along the other side. Apparently, Darwin would pick up a certain number of pebbles, and, rather like a cricket umpire, would discard one each time he completed one circuit. During these circuits he would do his thinking.

thing I being in the the side of Sir Hedley when he wife first Down garden over-wilder-illustrate just it was, he to a brick near us. I wall was high. "My out here, brambles", give you thick the



The next remember is garden at the house. told us that and his moved into House, the was an grown ness. To how bad pointed wall just think the about 4ft wife and I were clearing the he said, "and to an idea of how undergrowth

was, my wife suddenly cried out to me, "Look, Heddes, I've found a wall!", and this is the wall that you can see over there". They continued to hack away at the undergrowth, and came across what they thought was a briar rose, which they cut down, and did not dig up. This rose from then on was able to thrive, because it was not surrounded by weeds. A while later, they had a visit from an elderly Wedgewood relative. Darwin had married Emma Wedgewood, who had come to live in Kent from the family house, Maer Hall in Staffordshire. The elderly relative looked out of an upstairs window in the house and said to the Atkins, "I see you still have the Maer Rose. It seems to be thriving". Apparently, Emma Wedgewood had brought this rose with her when she moved, and this was the "briar rose" that was nearly destroyed during the clearing process.

After this, we were taken into the house, and shown Darwin's study, which was almost as he had left it, and we were shown the living-room. In this room is Emma Darwin's piano, and I remember that I was allowed, as a medical student, to play it. I don't know if that would happen today. We then went upstairs to the flat where Sir Hedley and his wife lived, and were given coffee and biscuits. One of my fellow students, Anne Garnons-Williams, picked up a beautiful piece of orange-pink coral which was on a shelf over a radiator, and was just admiring it when Sir Hedley came over. "Oh yes, I got that when we visited the Great Barrier Reef in Australia. What a wonderful place! Do you know, in my travels around the world there are three things that I will never forget. The first is, indeed, the Great Barrier Reef. Such beautiful colours! The second is the Kruger National Park in South Africa. Some amazing animals there! And the third thing is, erm,erm.....Oh, it seems to have slipped my mind for a moment. Do come over here and see this". And with that, we were regaled with another story. At the end of the morning, he was talking about his wife, whom he obviously loved, and extolling the virtues of her cooking, in particular her treacle tart. Apparently, one Sunday, he and his wife entertained a wealthy businessman to lunch. Sir Hedley was hoping to get this man to donate, I think, £200,000 to renovate the surgical research

centre at Buckston Browne Farm, which was owned by the Royal College of Surgeons and was adjacent to Down House. Treacle tart was served, and was much appreciated by the businessman. After lunch, Sir Hedley took the man to show him the buildings that needed attention. "How much money did you say you needed?" asked the man. "Two hundred thousand pounds", said Sir Hedley. "That was excellent treacle tart. You can have the money", said the man.

Back at Guy's, we finished the firm, and, as was customary in those days, we arranged the firm dinner. Firm dinners were arranged, and paid for, by the students on the firm, to thank the teachers (consultant, registrars and housemen) for teaching them over the previous three months. Sometimes, we went out to a pub or a restaurant, but on this occasion we decided to invite everyone to the flat in Kennington where I was living at the time. Several of us did the cooking, and we were amazed when Sir Hedley accepted the invitation to come. We all thought that it was a great honour to have the President of the Royal College of Surgeons in our small student flat. The menu consisted of gazpacho (a cold tomato soup from Spain), followed by a cold buffet, with a joint of beef, a ham, and various salads. Sir Hedley seemed to enjoy himself, and was particularly impressed with the gazpacho. "Could you give me the recipe for my wife?" he asked me at the time.

I'm not sure whether it was the next day or the day after, I came into Guy's at lunchtime, and it gradually became apparent that something was seriously wrong. One of the housemen had been admitted with severe dehydration following vomiting and diarrhoea, several of the students were very unwell, and it was rumoured that Sir Hedley was at home in bed. Guy Hartfall, who was the senior registrar on the firm, came into "The Spit", which was the name given to the canteen near the front quad, and with an ashen face and in clenching mode said to me "What Machiavellian schemes have you been up to, Lavelle?" It transpired that at least half of the people who had attended the firm dinner had gone down with food poisoning, and the whole event had to be

reported to the Department of Public Health for investigation, but no definite conclusion was ever reached as to the source of the infection. The day of the dinner was extremely hot, and I remember that we did not have a fridge big enough to accommodate all the cooked meats, which were just left around in the kitchen, so I'm sure this was the cause of the problem. Naturally, I was very upset as it was in my flat and I had done a lot of the cooking, and so I wrote to Sir Hedley apologising, and enclosing the recipe for the gazpacho. Typically, I actually got a reply, which I wish I had kept. "Thank you so much for the recipe," he wrote, "and also for the most excellent firm dinner. I'm sure my illness was nothing to do with the delicious food".

Some time after the firm dinner, Sir Hedley retired as a consultant at Guy's, and in those days it was customary for the consultant to have a final ward-round, which was advertised in the hospital and could be attended by anyone. Often, several of the other consultants would come to pay their respects, and I think about 40 people came to Sir Hedley's. Usually, one or two patients would be found, to illustrate the consultant's particular field of expertise, and in Sir Hedley's case, I remember two patients, one who had had a hypophysectomy for metastatic breast cancer, and the other had had appendicitis. On the morning of the ward-round, which was at about 11 o'clock, I got a message somehow that the sister on the ward, Jill Thoday, wanted to see me. I went up to the ward, and she showed me some sheet music. "Sir Hedley is wondering if you could play this at his last ward-round", she said. I was known as a musician at Guy's, because I used to write the music for the annual Residents' Play, which was performed every year in the physiology lecture theatre in the last week of January. A play would be written, and the story always followed a formula, whereby there were "goodies" and "baddies", and the main characters were based on the consultants. The "baddies" tried to take over the hospital, but in the end the "goodies" overcame them. Anyway, the sheet music that I was shown



that morning was called “The Appendicitis Two-Step”, and was a rather simple, and banal, tune. The composer of the piece was a certain “Felix Mendelssohn”. At that time, there was a piano on every ward, and at Christmas time I used to go around the wards playing carols for the patients to sing. I had a quick run-through of the music just before the round. Sir Hedley arrived on the ward with his entourage, as to our amazement did several of the other consultants, both surgeons and physicians. One of the students presented a patient who had had appendicitis, and Sir Hedley then proceeded to read a very moving story written by Sir Frederick Treves. It is called “The Idol With Hands of Clay”, and is one of several stories based on real events which Treves experienced during his career, and which are contained in a wonderful book that I was able to get hold of many years later called “The Elephant Man and Other Reminiscences”. In this particular story, the wife of a local GP developed appendicitis, and because she worshipped her husband, she insisted on him doing the operation, instead of the local surgeon. He, the GP, had wanted to be a surgeon but had not quite made the grade, but always thought that he should have been one. In short, the GP operated on his wife, and the operation went badly wrong. He cut the wrong structure and there is a mention of something “gushing” out. His wife died a few hours later, but she regained consciousness long enough to tell the husband that it was not his fault and that he was still her hero. After this reading, Sir Hedley held up the sheet music and said “Now, I would like you to hear this piece of music. It is called “The Appendicitis Two-step and it was written by Felix Mendelssohn, not the Felix Mendelssohn, his great grandson, whom I met when I was at Johns Hopkins Hospital in Baltimore. I wonder, Mike, if you would play it for us?” I then played through this little piece on the ward piano, much to the amusement of all those present. The next case to be presented was that of a woman who had metastatic breast cancer and had had a transsphenoidal hypophysectomy, where the pituitary gland is removed through a small crescent-shaped incision just

between the eye and the nose. The patient looks as if they have been out deer stalking and held the telescopic sight too near their eye and been damaged by the recoil of the rifle. This would count as “keyhole surgery” nowadays, but in those days that term had only been used in the film “Doctor in the House”, where James Robertson Justice as Sir Lancelot Spratt admonishes the medical student for indicating a tiny incision. Removing the pituitary seems to be barbaric, but it was effective in prolonging life in some of the patients, and was the forerunner of hormonal manipulation, which nowadays is, of course, done by giving tablets to the patient. This particular patient was one of many that Sir Hedley had treated, and eventually the breast cancer unit at Guy’s was named after him. One of his main contributions to the treatment of breast cancer was in the setting up of clinical trials to test the effectiveness of different treatments, and he was very keen to see that these trials were performed ethically. As can be imagined, if a trial is set up to compare two treatments, then it must be established before the trial that there is no known distinct advantage to either of the treatments, otherwise one would be entering a group of patients into one of the treatment arms knowing that these patients were going to get an inferior treatment. Sir Hedley was one of the clinicians who established rigorous ways of checking this, such as building into the trial a mechanism for looking at the results half-way through the trial period, so that the trial could be stopped if it was really obvious that one treatment was better than the other.

Unfortunately, after his last ward-round, I only saw Sir Hedley once or twice in passing. I do, however, feel very privileged to have known, and been taught by, a man who contributed a lot to the science of surgery, and did it in a very dignified and kind way.

# News from the Dean of the Medical School

Professor Nicki Cohen

The last six months have flown by.

The GKT team is evolving, as is the student body. 5th July marked the highlight of the year, Borough market was again a sea of purple as 410 new doctors graduated at Southwark Cathedral. That Saturday, the Greenwood theatre was filled five times with GKT applicants for the upcoming admissions round that closes next month. Our new graduate entry medicine cohort has just started and our Stage 1 starters begin their GKT story next month too. Related to our discussion last time, the Dean's Group is flourishing, as is the related Faculty 50.

GKT Faculty is spending this year working on a curricular refresh of Stage 1, Stage 2 and the Project work that students undertake through their degree. Listening to Dean's Group participants, there is clearly a need to curate stage 1 material, consider the balance of subjects covered, allow for some stretch towards subjects such as data skills and digital technology that will define future medical careers, and build more structure into the projects that students undertake through their journey. In many ways these define their future paths – we should do more to let students shape their futures while medical students. We will do this while providing more support around students' transition into clinical learning – students who feel part of a team will learn better and engage more with the range of clinical learning activities at our excellent hospital placement sites.

The Faculty team is expanding to support this work and the future feel of the school to enable

students to feel more connected to the Faculty. The weekly "Dean's drop in" has been a useful informal route for me to help guide individual students, and I am optimistic that we can build on relationships between Faculty and students in the next year too. We need to know our community, students need to feel part of the GKT family.

All this change happens on the backdrop of consistency. As an alumnus colleague who has recently joined as a senior academic described to me just the other day: Guy's is still Guy's, St Thomas's is the same, King's remains King's. I may have been gone for 30 years, but so much feels the same - KCL thrives and the values we hold dear remain central.

We also hold dear colleagues who have recently departed. I am delighted that the Gazette editors have chosen to honour Professor Phillips who was an outstanding and consistent feature of GKT for so long. We miss him.

I wish you all a happy, successful academic year, and to updating you again in the next edition.



# Curriculum Rethink?

Morgan Bailey MBBS3

This article forms part of a reply to the wider thinking occurring at our medical school. It does not reflect the opinion of the student body nor the breadth of my opinion, which is dynamic and remains in flux. I hold much admiration for those supporting & delivering our education, and these words do not account for the hard work which we as students are not privy to behind the scenes. I hope you enjoy.

**Our Faculty has been doing a lot of thinking recently: particularly about our curriculum. I had the privilege, as secretary to the GKTMSA this year, to attend a Curriculum Refresh Committee hosted by the dean of the Medical School Professor Nicki Cohen, to witness and contribute to the thinking currently occurring at the level of senior administration within GKT and the Faculty.**

Let me set the scene. The meeting was analogous to sitting at the bridge of the USS Enterprise (or the Death Star – depending on sci-fi your persuasion!) Like my tedious analogy, the irony quickly became lost, especially in the naming of the meeting. That is to say the title was not particularly fitting. As the meeting went on, it seemed that the faculty had not yet agreed what was being “refreshed”, to what extent, and perhaps more pertinently: why? Why are our GKT leaders incredibly keen and motivated to produce yet another trilogy of disappointing sequels?!

Unfunny jokes aside, let us explore some possible explanations, particularly relating to student feedback. The current school of thought is that Stage 1 of MBBS needs to be streamlined, with some lectures (not lecturers) facing the axe, due to the overwhelming volume of work. This is in response to student feedback. As someone who “suffered” through MBBS Stage 1 (sorry freshers), I would gladly see the back of our psychology block in GBE. Yet, this brings one issue to light: subtractions from medical curriculums are

guided primarily by opinion. Who is to say that Stage 1 content is not important, when arguably everything we learn is applicable to our careers?

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**“Lack of detailed exam feedback, delayed results (which are marked by a computer), delayed timetables, cancelled teaching (or lack thereof), lack of communication from Faculty, KEATS being an uncoordinated mess.”**

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Regardless of the above, students across the entire trilogy of Stages remind Faculty about the universally recurring issues each year, of which none had been discussed at length in the particular meeting I attended. For instance: Lack of detailed exam feedback, delayed results (which are marked by a computer), delayed timetables, cancelled teaching (or lack thereof), lack of communication from Faculty, KEATS being an uncoordinated mess (since the upgrade to Moodle 4). The list is almost endless. Many of these issues have persisted for almost as long



as our precious “GKT” has existed, which is to say, since 1998. Indeed, journey through the looking glass that is the Gazette archives and we can see student satisfaction sat at a frightening 52% in 2012, with many of the same issues persisting (though, the renaming of King’s Medical School back to GKT might have boosted Faculty’s score). Compare to today, King’s sits at a solid 74%. Then, begin comparing with other Medical Schools and realise we place 24th out of 31 medical schools with the available statistics (National Student Survey). It is frankly poor. How can these administrative issues persist in-perpetuity across a decade and continue to remain as part of the lifeblood of GKT? I am not particularly keen to have our current reputation coursing through my veins.

On the flipside I shall give credit where credit is due. The Faculty recognises that satisfaction scores are poor. Yet, the Faculty’s idea of running (changing the curriculum) before you can walk (publishing timetables before induction day) seems incredibly optimistic.

As harsh and unforgiving as my words may sound, many of my questions would have undoubtedly been raised by my student colleagues elsewhere, yet answers have yet to surface. Additionally, many of the touted improvements to the curriculum itself will not affect the current student body - the reality of a longer term project - leaving those of us already enrolled to try and traverse the existing hazy

curriculum landscape - compounded by the woes of administration.

Professor Cohen, in our interview in our 150th anniversary edition, had acknowledged the struggles of supporting a large cohort of students. I am grateful to our Dean for endeavouring to listen to our qualms: both to students on the ground (see the “Dean’s Group”) and to those in elected ivory towers such as myself (the MSA). Yet, holding an ear to the virtual speakerphone that is student feedback seems to have caused the opposite of the desired effect: the Faculty is now running before walking.

I believe we need to rethink this refresh.

*I encourage all forms of comments & replies directly to the Gazette inbox, and invite those from Faculty to give us their views - gktgazette@kcl.ac.uk.*

### Shortforms

GKTMSA – The Guy’s, King’s and St Thomas’ Medical Students’ Association

MBBS – Bachelor of Medicine, Bachelor of Surgery

GBE – Genes, Behaviour and Environment (the worst block of Stage 1)

KEATS – King’s E-Learning and Technology Service

The Deans Group - A group of students across stages, paid to attend regular meetings with the Dean to represent the student voice.

# News from the MSA President 23-24

Ciana Dsouza **Intercalating iBsc Primary Care**

Welcome all Freshers to GKT!

Firstly, a massive CONGRATULATIONS to you all for getting into the finest medical school in the country we are so proud of you! here's to never having to do the dreaded UCAT again, stressing out from messages on the student room threads 'CaN I gEt iN tO mEdiCal scHoOl wiTh AIL 9's, A\*s and 3000 UCAT' (and not getting a jumpscare whenever you get an email from UCAS). You have all worked incredibly hard, to get your well-earned place at medical school and we can't wait to have you here!

Starting medical school can be filled with a rollercoaster of emotions; the excitement of finally starting something you have looked forward to for so long and the stress of such a big change in your lives but no need to worry. Your trusty MSA committee, along with the entire the medical school community are here to welcome and support you, we've all been there and know exactly how you feel. Have a "silly" question? Remember, in our world, there's no such thing! Need directions across this labyrinthine campus? We've all been lost here at some point - we're your friendly human GPS.

Although the degree may initially seem like a long time, with most of your non-medic friends graduating before you, it will definitely go by quicker than you expect and is so worth it. Medical school gives you the unique opportunity to meet so many different people and take part in so many different things. Try that new sport (even if you have two left feet), sit next to that person in lectures (maybe they'll share their notes), go to that event (you

might discover a hidden talent), and join that society. You never know what you may learn and what friendships you may make along the way. Your journey might just surprise you in the most unexpected ways.

Remember our inboxes are always open ([msa@kcl.ac.uk](mailto:msa@kcl.ac.uk)) and soon, you'll have the chance to elect your year one reps who can represent you and ensure we make this first year the very best it can be.

We can't wait to put on amazing events for you this year and welcome you within our community. My biggest piece of advice to you: **GET INVOLVED WITH EVERYTHING.**

Got questions or just fancy a chat? Email me anytime at [ciana.dsouza@kcl.ac.uk](mailto:ciana.dsouza@kcl.ac.uk). or dm @gkmtsa.

From my fabulous committee and I, we wish you an unforgettable first year and a future here at GKT that's brighter than a surgical light. Get ready for caffeine-fueled study sessions, making New Hunt's House library your second home - and Stuart and Despo as your unofficial parents!

MSA Love,  
Ciana Dsouza  
MSA President 2023-24





# Dental Corner

*Photo: Guy's Gazette, Volume 105 No  
2413 - June & July 1991*



# A Snapshot in to Dental Anxiety

Soufia Koohikar **BDS2**

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## 1.1 UNDERSTANDING DENTAL ANXIETY

Dental anxiety is “a term used to describe fear, anxiety or stress in a dental setting”. It is usually associated with certain triggers such as “needles, drills or the dental setting in general” [1]. Dentistry has often been viewed as a gory profession, a medieval backstreet practice that was initially carried out by barber-surgeons, not officially regulated until the 1878 Dentist Act was passed [2] and the British Dental Association being formed only a year later [3].

The mouth is often viewed as one of the most sensitive and intimate parts of the body which may contribute to the hesitancy in which individuals approach the profession. If a patient is unable to overcome their phobia, they may opt to delay or avoid treatment which can prove fatal. By taking all these various factors into consideration, the widespread hysteria surrounding dentistry is definitely a cause for concern – something that must be tackled in an effective manner in order to overcome the barriers that individuals face when accessing oral health services.

## 2.1 ANCIENT DENTISTRY

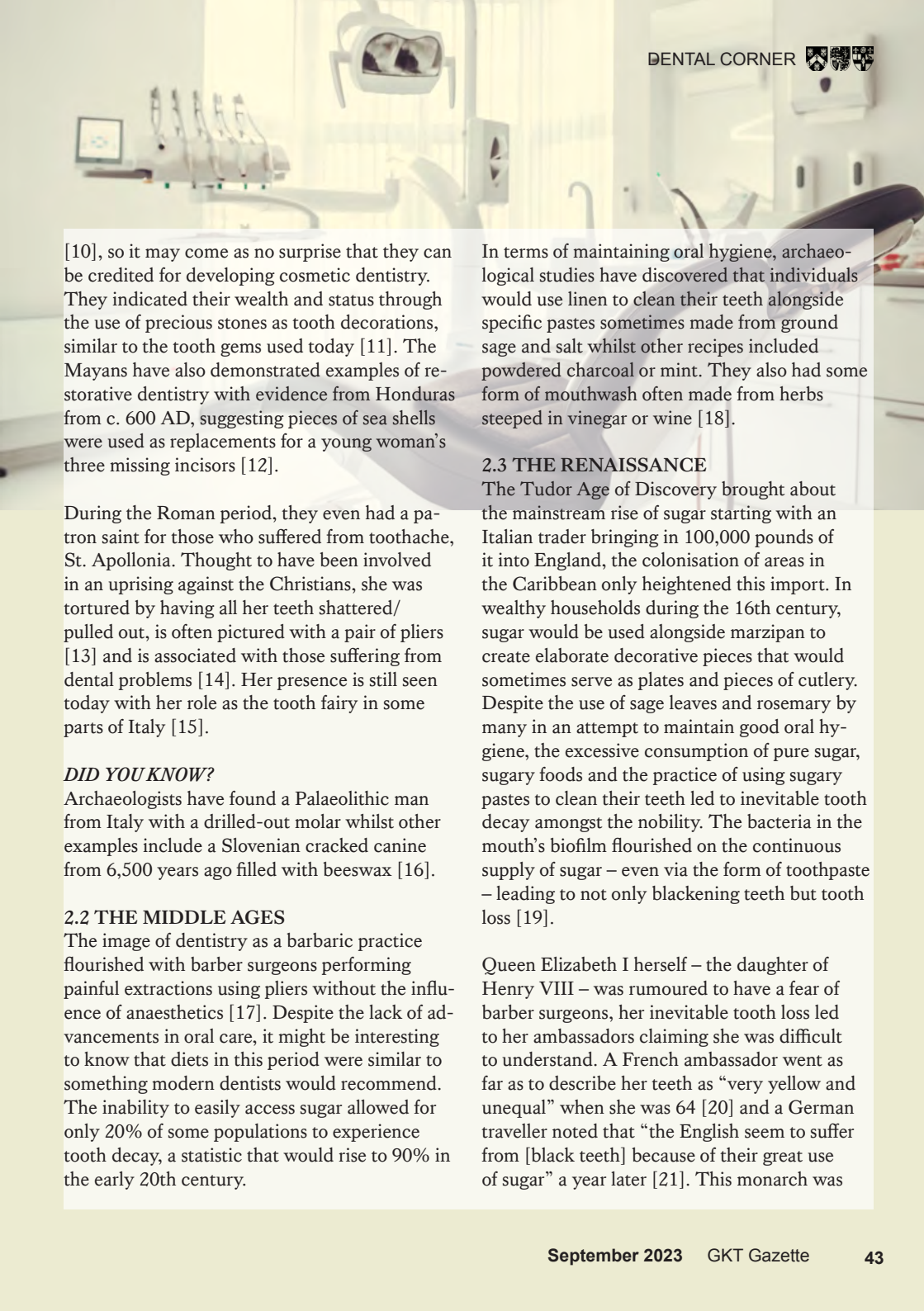
Given the lack of oral hygiene available, it may be unexpected that those living in the ancient world did not have as many cavities as individuals in modern society do. This was partially due to the absence of sugar and processed foods. However, this does not mean that their teeth were in the best condition; the coarse food they consumed required an extensive amount of chewing which would have worn down their

teeth, something that has been exemplified by Egyptologists discovering sand in preserved food [4].

The belief that toothaches were caused by tooth worms was a theory thought to have been developed by the Babylonians, with records mentioning these worms as early as c. 1800 BCE. “The Legend of the Worm” is a story from a cuneiform tablet\* (\* [5]) which likens the tooth worm to that of ‘a demon which drinks the blood and eats the roots of the teeth’ [6]. In fact, this belief was held up until at least the 16th century, as seen in Shakespeare’s *Much Ado About Nothing*, “What! sigh for the tooth-ache?... Where is but a humour or a worm?” (Act 3, Scene 2) [7]. Therefore, through this characterisation, it’s no surprise that attitudes to dentistry would have created anxiety among the population.

Continuing the discussion around ancient Egyptians, the Edwin Smith Papyrus of c. 1700 BCE details treatments for several dental ailments with similar principles used today, for example, mixing ground barley with honey mimicking that of a composite filling. The first known dentist bearing the title of “Doctor of the tooth”, Hesy-Re, an official physician who lived in ancient Egypt c. 1600 BCE, is often credited for being the first to recognise periodontal disease [8]. The physicians of the time also engaged in reconstructive dentistry, creating bridges by using metal wires to reattach lost teeth or using donor teeth entirely [9].

The Mayans are known for having been ‘one of the most advanced civilisations in the Americas’



[10], so it may come as no surprise that they can be credited for developing cosmetic dentistry. They indicated their wealth and status through the use of precious stones as tooth decorations, similar to the tooth gems used today [11]. The Mayans have also demonstrated examples of restorative dentistry with evidence from Honduras from c. 600 AD, suggesting pieces of sea shells were used as replacements for a young woman's three missing incisors [12].

During the Roman period, they even had a patron saint for those who suffered from toothache, St. Apollonia. Thought to have been involved in an uprising against the Christians, she was tortured by having all her teeth shattered/pulled out, is often pictured with a pair of pliers [13] and is associated with those suffering from dental problems [14]. Her presence is still seen today with her role as the tooth fairy in some parts of Italy [15].

### ***DID YOU KNOW?***

Archaeologists have found a Palaeolithic man from Italy with a drilled-out molar whilst other examples include a Slovenian cracked canine from 6,500 years ago filled with beeswax [16].

## **2.2 THE MIDDLE AGES**

The image of dentistry as a barbaric practice flourished with barber surgeons performing painful extractions using pliers without the influence of anaesthetics [17]. Despite the lack of advancements in oral care, it might be interesting to know that diets in this period were similar to something modern dentists would recommend. The inability to easily access sugar allowed for only 20% of some populations to experience tooth decay, a statistic that would rise to 90% in the early 20th century.

In terms of maintaining oral hygiene, archaeological studies have discovered that individuals would use linen to clean their teeth alongside specific pastes sometimes made from ground sage and salt whilst other recipes included powdered charcoal or mint. They also had some form of mouthwash often made from herbs steeped in vinegar or wine [18].

## **2.3 THE RENAISSANCE**

The Tudor Age of Discovery brought about the mainstream rise of sugar starting with an Italian trader bringing in 100,000 pounds of it into England, the colonisation of areas in the Caribbean only heightened this import. In wealthy households during the 16th century, sugar would be used alongside marzipan to create elaborate decorative pieces that would sometimes serve as plates and pieces of cutlery. Despite the use of sage leaves and rosemary by many in an attempt to maintain good oral hygiene, the excessive consumption of pure sugar, sugary foods and the practice of using sugary pastes to clean their teeth led to inevitable tooth decay amongst the nobility. The bacteria in the mouth's biofilm flourished on the continuous supply of sugar – even via the form of toothpaste – leading to not only blackening teeth but tooth loss [19].

Queen Elizabeth I herself – the daughter of Henry VIII – was rumoured to have a fear of barber surgeons, her inevitable tooth loss led to her ambassadors claiming she was difficult to understand. A French ambassador went as far as to describe her teeth as “very yellow and unequal” when she was 64 [20] and a German traveller noted that “the English seem to suffer from [black teeth] because of their great use of sugar” a year later [21]. This monarch was



regarded as being responsible for establishing England as a world power; she had achieved many notable feats during her 45-year reign including the defeat of the Spanish Armada [22]. Therefore, in hindsight, her dental anxiety and resultant lack of oral hygiene may not have been the best example for her subjects to follow.

Despite these setbacks, many significant improvements and discoveries regarding the oral cavity would greatly advance our understanding of it, including:

**Leonardo Da Vinci:** accurately drew the skull and teeth, identified normal occlusion and described different sinuses [23].

**Ambroise Paré:** a Frenchman known as the father of modern surgery. He created artificial teeth from bone and ivory, popularised palatal obturators and used proper tooth extraction and transplantation [24].

**Bartolomeo Eustachio:** explained the difference between enamel and dentine. He was the first to describe the dental pulp and its role in sensation within the teeth. He also published the first book entirely devoted to tooth anatomy in 1563 [25].

### ***DID YOU KNOW?***

It is believed that teeth were referred to as 'pearly whites' due to the Renaissance practice of rubbing pulverised stone and crushed pearls onto teeth to remove plaque [26].

## **2.4 THE AGE OF ENLIGHTENMENT AND SCIENTIFIC REVOLUTION**

This era saw the rise of modern dentistry with the movement from superstition into actual science-based practice. Pierre Fauchard, "the Father of Modern Dentistry" [27] introduced dental fillings, dental prosthesis and dental braces as well as the notion that sugary acids

such as tartaric acid were responsible for tooth decay [28].

The practice of nobility having dentures made from the teeth of those in the lower classes was exemplified by George Washington's dentures. They were rumoured to have come from either enslaved or poorer members of society who were forced to endure the painful extraction, giving up their teeth in exchange for money in the case of the latter group [29].

## **2.5 THE MODERN AGE AND THE IMPACT OF WAR**

In 1780, the first toothbrush prototype was rumoured to have been made out of pig hair by William Addis – a prisoner who used a rag with soot and salt to clean his teeth but deemed it insufficient. He later created his own version by saving a small bone from a meal, drilling holes into it and tying in bristles [30]. After his release, he mass-produced it, gathering a great fortune for himself and his family [31]. Before anaesthetic was introduced, cocaine was used as an alternative [32] but when Horace Wells pioneered the use of nitrous oxide in 1844 the industry was changed [33]. This safe and effective sedation method done with hypodermic syringes allowed dentists to quickly ease patients and administer their course of treatment. An alternative in the form of chloroform was found to be just as beneficial, however, this was later banned due to the high level of fatality associated with its links to respiratory failure [34]. Conflict and war in societies have often seen the rise of renewed medical technology; this is especially true for dental care. During the Boer Wars, a high proportion of British soldiers were identified as having problematic teeth, so much so that this led to approximately a third of them being deemed unfit to serve [35].

The start of the First World War in 1914 saw the crew going into battle without a single

dentist. This poor foresight resulted in civilians having to treat the patients instead. By the end, around 850 dental officers had been appointed, suggesting that the importance of good dental care was finally being acknowledged [36]. After all, without proper dentition, soldiers would be unable to bite open the fuse of their grenades or perhaps the simplest of things, eating food and communicating would be made difficult [37]. The aftermath of various wars only further propelled dentistry's restorative and cosmetic functions with dental casts being made of facially injured individuals. By working alongside plastic surgeons, they were able to successfully rebuild the faces and lives of countless soldiers [38]. The creation of the NHS in 1948 allowed for widespread healthcare [39], something which was incredibly necessary as during the same year "more than three quarters of the population over the age of 18" had "complete dentures" [40]. The year 1955 saw the first adverts for Gibbs SR toothpaste [41] and later in the 1960s water fluoridation was introduced [42].

### 3.1 THE IMPACT OF MEDIA ON PUBLIC PERCEPTIONS OF DENTISTRY

It is without a doubt that our opinions can be influenced by external factors. The negative portrayal of dentists is seen through countless films and books, especially those aimed at children which can easily shape their views of the profession. In films such as *Finding Nemo* (2003) and *Charlie and the Chocolate Factory* (2005), dentists are characterised to be evil, with screaming patients and tense background music seen in the Finding Nemo scenes whilst Willy Wonka's father comes off as hostile, obsessive and abandons his son after learning of his chocolatier dreams. In literature, *Demon Dentist* (2013) by David Walliams details the story of a 12-year-old's suspicions around a new dentist in town who gives out "acidic toothpaste which

can burn holes through stone" [47]. Therefore it is undoubtedly clear that this image painted by different mediums has created an unfavourable bias within children towards dental professionals. Unfortunately, this perspective only continues with films aimed at adults, within the horror genre entirely dedicated to themes of dentistry.


### 3.2 WHAT DO WE DO NOW TO REDUCE DENTAL ANXIETY?

- Meditation
- Deep breathing
- Distraction
- Guided imagery
- Progressive muscle relaxation
- Weighted blankets
- Hypnosis
- CBT
- Laughing gas
- Oral anxiolytic tablets
- Conscious sedation
- General anaesthesia

### CONCLUSION

With 1 in 10 people avoiding treatment due to their dental anxiety [48], there is more need now than ever to tackle this issue and overcome it to ensure there is one less barrier to patients accessing healthcare effectively.

Due to page limitations, references are available on request at [gktgazette@kcl.ac.uk](mailto:gktgazette@kcl.ac.uk)



The Hodgkin Building (previously the  
Medical School building) in Summer 2023



# Science and Research

*Photo: Guy's Gazette, Volume 105 No  
2411 - April 1991*



# Interview With Dr Malcolm Tunnickliff: Emergency Medicine

Arnav Umranikar **MBBS3**

*Unless otherwise stated all text in speech marks is a direct quotation from Dr Tunnickliff. I have otherwise paraphrased his words and added my commentary.*

As I ascended the stairs of the KCH Emergency Department, I couldn't help feeling a little tired. It was 08:00 and a morning pick-me-up was long overdue. At this time, I'm usually tucked in bed, slowly arising from a mellow slumber. One can only imagine my embarrassment, when in greeting Dr Tunnickliff, he informed me that he had been working for the last 36 hours. In a rather Damascene moment, I realised that perhaps only those made of stronger stuff are fit for a life in emergency medicine.

Anecdotally, however, it seems that emergency medicine is an exciting career choice amongst current and prospective medical students. The cocktail of chaos, variety, rapidity, drama, and sheer fun seems to be a potent and thrilling combination for many. So, for those in whom a chime of recognition comes about when reading the latter sentence, this article hopes to provide insight from one of its doyens. But I hope that everybody reading these pages gleans something thought-provoking from these words.

\*

I have a theory that in many ways where a doctor ends up in their career probably stems from why they chose this profession in the first place. It was for that reason that our conversation started with

my asking Dr Tunnickliff why he wanted to be a doctor in the first place. I hope some readers will relate to his pleasantly honest sentiment that he didn't know at the time, and perhaps still doesn't know now. *'I can remember being very young and saying to my parents that I wanted to be a doctor; I don't know why.'*

What was palpable in our interview was his passion for the job. To the extent in which he not merely enjoyed his work, but rather that it simply wasn't work to him. Perhaps that is because he is reaping the harvest of a childhood desire sowed for long, long in the past. Or perhaps, the reality is more prosaic; *'My mum always used to joke that because she had to take me to the emergency department with so many various injuries as a child, that that was probably why I wanted to do it.'*

But what about this job makes it so enjoyable to him? *'Being an emergency physician is an excellent job. I still get a buzz in resus and after I go home from work. It's something of an adrenaline rush. The buzz is one thing, but I love the instant gratification as I have a short attention span. I could never stand ward rounds and social worker meetings; I always wanted to put a line in and get on with things.'*

I wondered what the value is of being a generalist in a seemingly ever specialising world. *'We've seen over the last 20 years a greater degree of specialisation in medicine. We're slowly seeing the value of the generalist again; because they see*



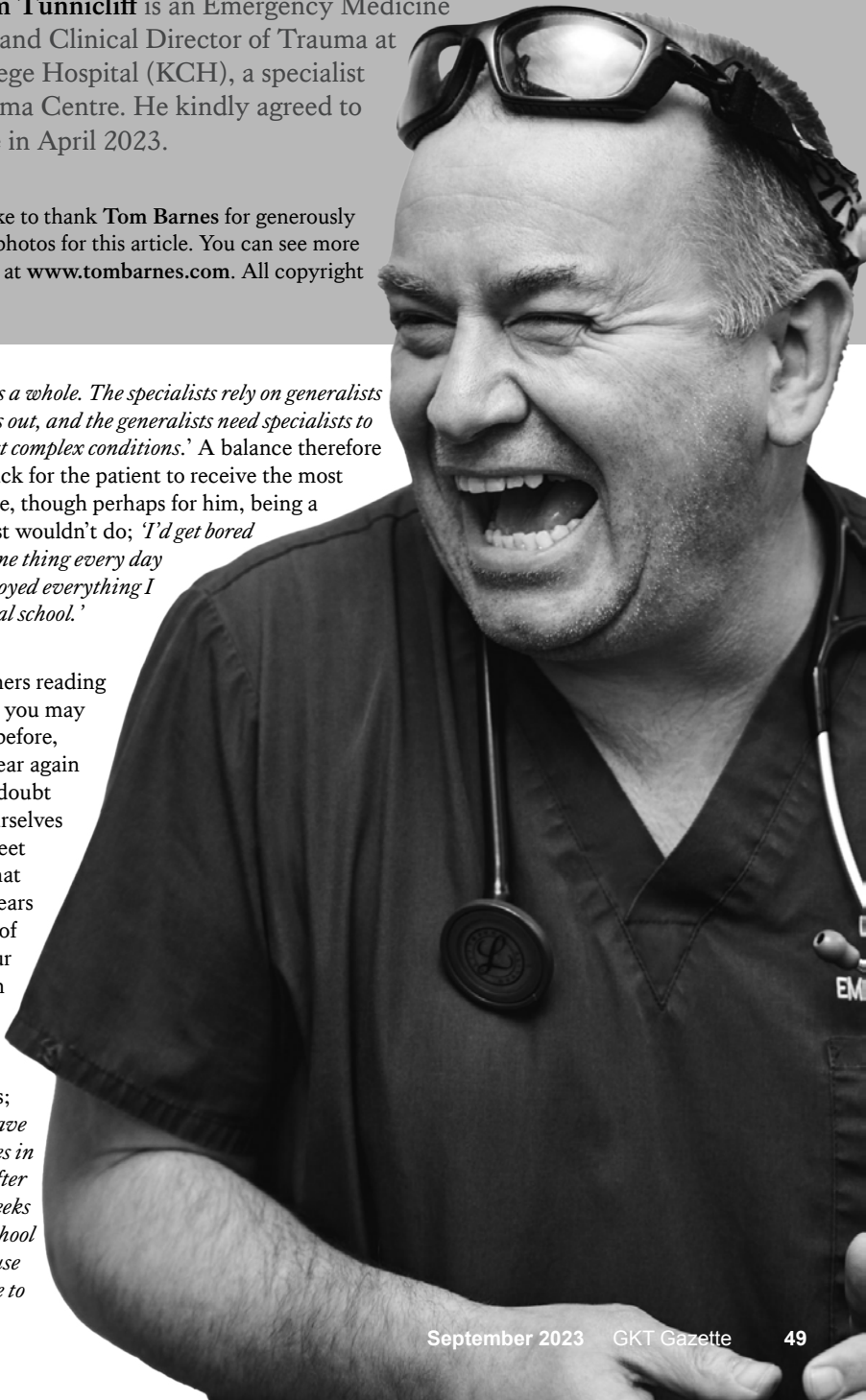
**Dr Malcolm Tunncliff** is an Emergency Medicine Consultant and Clinical Director of Trauma at King's College Hospital (KCH), a specialist Major Trauma Centre. He kindly agreed to speak to me in April 2023.

I would also like to thank **Tom Barnes** for generously providing the photos for this article. You can see more of Tom's work at [www.tombarnes.com](http://www.tombarnes.com). All copyright reserved.

*the patient as a whole. The specialists rely on generalists to rule things out, and the generalists need specialists to treat the most complex conditions.' A balance therefore must be struck for the patient to receive the most effective care, though perhaps for him, being a specialist just wouldn't do; 'I'd get bored doing the same thing every day because I enjoyed everything I did at medical school.'*

\*

For the freshers reading these pages; you may have heard before, will likely hear again and will no doubt vocalise yourselves the bittersweet sentiment that university years are the best of your life. Our conversation drifted towards these most halcyon of days; *'We didn't have mobile phones in 1990, and after five or six weeks of medical school I decided to use the payphone to*





*call my parents. My mother's first words were; 'So, you're still alive!'. I think that showed how much I enjoyed it.'*

My bringing up of this subject matter was for a very clear purpose. As we know, medicine is an art and therefore your skill as a doctor is dependent upon myriad facets of your character and development, not just the facts and algorithms you know. Whilst the curriculum and exams are necessary boxes to tick, one doesn't learn an awful lot about themselves in that process. How can one be a great doctor without that? And I'd posit that you don't get a better chance to do just that in your university years, where we're fortunate to have enormous opportunities to experiment with what we're capable of, with relatively few consequences. *'The attitude at medical school was work hard, play hard. And by play hard, I included drink hard.'* There shouldn't be any compulsion to consume ungodly amounts of booze, but there should be to get involved in a sport, creative pursuit, or cultural society of some sort. Looking outside oneself is a mirror for what lies within.

And if *that* isn't impetus enough, at least it will make you a better doctor. *'Sport was very impor-*

*tant to me, and extracurriculars really helps you interact with people, and work as a team because it makes you respect what others do. In rugby, a forward has a very different role to a back, and as individuals they wouldn't be able to win a game.*

*The same happens in medicine; unless the individuals of different specialties work together, the patient is not going to have a good outcome.'*

Not to mention the inevitably enormous impact your peers will have on you, and you on them; hopefully for the rest of your lives. *'I met some of my very best friends to this day in medical school. Extracurriculars help to develop camaraderie with your peers. The camaraderie helps to absorb pressure, and your peers help to support you.'*

What becomes clearer and clearer as time passes, is that having a support system with your peers is critical, not just in university but beyond. Medical schools can feel like shapeless mass factories pumping out students; the artisan schools where everybody knew everybody are relics. And with a greater and greater burst of medical graduates coming out of universities, comes a greater flooding of the workplace; and inevitably the support structures here have been slowly dissolved. *'To me, what's really been eroded is the relationship*

*between doctors of different grades and the team ethos. I think that's a core thing that accounts for the ill-feeling in the current state of the NHS, amongst many other things. I invariably used to work closely with the registrar, SHO or consultant of the firm when I was on call. Now a foundation doctor might never be on call with their consultant. Emergency medicine, however, is almost the last bastion of the team.'*

\*

The foundations that are baked into graduates in medical school days should prepare them, not just in terms of competence but also psychologically, for an ever-changing world. The pace of such change is dizzying and relentless; and the effects bleed into all of society. I asked Dr Tunnickliff how the specialty had changed over the years. A patient 25 years ago with unstable angina might have had to be admitted and wait for weeks or months for an angiogram say. If they had COPD or diabetes, it was unlikely they would survive. Today, medical advancement has afforded a patient with acute coronary syndrome and multiple co-morbidities to expect to receive a series of prompt tests and have a fair shot at survival. Indeed, as great progress has been made as the problems of old have been met with new solutions, it naturally follows that we must consider the problems of today, and their potential solutions. *'There is an ongoing problem in emergency medicine, and that is crowding in emergency departments, and the demand. This is multifactorial; the population is growing, we have fewer emergency departments, patients are much more complex.'* It is abundantly clear that these departments are becoming the *'victims of their own success'*.

*'There is also the public's expectation of instant healthcare. We live in a 24/7 culture; you can access your bank account at 3am and make a transfer to Australia. Everything is instant; so, people want that for their healthcare as well. The emergency department is no longer being used for emergencies, but instant healthcare.'* This cultural change is clearly deep rooted into the fabric of our society. The causes will be varied and complex. Undoubtedly the era of Amazon Prime and TikTok

has inflated people's expectations beyond the pace of reality, but the issue also partly stems from primary care. *'No longer do we have a family GP. This is a huge loss; they were great because they knew their patients and had a continuity of care. When GPs know their patients and what's normal and what's not, it reassures the patient and can stop an unnecessary trip to the hospital. That does not happen these days because we've lost the personal level of care.'*

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*“Everything is instant; so, people want that for their healthcare as well.”*

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With ambulance-loads of patients perhaps unnecessarily coming to hospital, it often means that a fair chunk of the job is to treat non-emergencies. This defeats the whole point of an emergency department. *'What takes the gloss off these days, is doing extraneous, bureaucratic stuff and seeing non-emergencies. I'm the last person who should be seeing a patient with high blood pressure. I can treat malignant hypertension, but I don't have the facility to bring a patient back and review them and investigate their hypertension. I can do the life-saving stuff, but for most people with hypertension; I don't need to see them.'*

\*

As our interview ended and I descended the stairs of the KCH emergency department, I thought about the precarious state emergency departments generally are in. They are a linchpin of the hospital and wider secondary care system. A career here can certainly be exhilarating, challenging, and satisfying. But without a cultural change towards healthcare, restructuring of primary care, and the political will to enable these changes, the job of an emergency physician will, ironically, be swallowed up by non-emergencies. To the peril of the patients and the system.

*I thank Dr Malcolm Tunnickliff very much for taking the time to speak with me and imparting his wisdom and insight onto these pages.*



# The Cervical Spine Paradox

Sammer Atta **MBBS3**

*With many thanks to Professor Anthony Graham*

**Whilst they may seem like relatively mundane bones that vary very little between different species.**

After all, the vertebrae of a snake, frog, elephant, or fish exhibit a remarkably similar appearance to the casual eye; this is most certainly not the case. I have always been interested in the unique ways in which animals have adapted to their surroundings and find the differences between their physiology/anatomy and ours a blooming area of interest – perhaps we can learn more about the prevention of certain medical conditions by seeing how they succeed where we fail. As part of my Student Selected Component in which I studied the axial skeleton, I came across a particularly fascinating phenomenon that I deemed worthy to be shared with you all.

Humans belong to a group of organisms known as “amniotes” which encompasses all reptiles, birds, and mammals. I would like to bring the focus to the cervical region of the spine within this group. Whilst various species of reptiles and birds vary in regard to the number of cervical vertebrae they exhibit, the same cannot be said for mammals. While there are over 5,400 mammalian species, almost every single one has 7 cervical vertebrae (Leboucq, 1898; Schultz, 1961; Starck, 1979; Narita & Kuratani, 2005). In this article, I invite you to explore the world of the axial skeleton, how its blueprints are ingrained into our very DNA, and the most intriguing part: why do mammals have such harsh constraints with regards to their number of cervical vertebrae?

### **An introduction...**

For context, humans have 33 vertebrae with varying appearances - this allows for their classification into either cervical, thoracic, lumbar, sacral, or coccygeal vertebrae.

Although this is the classical method of classification that many of us are acquainted with,

it is possible to argue that it is a relatively poor one since there is more complexity surrounding the matter: sometimes the morphology is not clear cut. For instance, if one were to look at the cervical vertebrae; C2-C6 have bifid spinous processes, whereas C1 has a posterior tubercle instead, and C7 has a singular spinous process known as the vertebra prominens; a feature seen in thoracic vertebra (Bland, J.H. and Boushey, D.R., 1990).

The lack of consistency surrounding the specific widely agreed regions of the vertebra makes their classification somewhat subjective; and hence the current method is potentially fallible. This is of particular importance when observing morphological changes because of mutations; which will be explored below.

### **Hox Genes – The Blueprints of Life**

To further appreciate the organisation of the vertebrae, one must understand how the regions are first assigned; and hence this is where the importance of Hox genes must be stated. First brought to light by the unusual phenomenon of homeosis (the changing of one body organ to another) in the fruit fly, hox genes are potent gene regulators during embryonic development; and can be thought of as genetic “blueprints” of the body plan of an organism. The change of one vertebral region to the next corresponds to the location of specific regions which relate to the Hox genes (Mallo, M. et al., 2010). It is important to note, however, that these strictly mark the anatomical position of the vertebral regions, and do not correspond to the number of vertebrae in each region.

The result of all of this is the formation of a cartilage scaffold which is the basis of the vertebral column, that then eventually forms the bony spine (Ihde, L.L., et al., 2011). In order to observe the initial stages of spinal development; Professor Graham aided me by acquiring and incubating chicken eggs for 6-7 days. The embryos were then isolated, fixed using formalin, and then



Chick embryos, cartilage stained with alcian blue; at stage 27 (around a week) of development .

left in Alcian blue stain (Wassersug, R.J. 1976). This resulted in the cartilage being stained a dark blue; including the early spinal column as well as the limbs. I took some remarkable photos to illustrate this.

### Developmental Constraints – The forgotten force in evolution

A giraffe has an extremely long neck in proportion to the rest of its body, whilst a mouse is the opposite – yet they share the same number of cervical vertebrae. One would find that, without of course taking in to account size, the giraffe's cervical vertebrae are much more elongated in shape compared to those of a mouse. On the other hand, birds and reptiles do not have the same constraints as mammals; and may opt to increase the number of vertebrae if they were to have longer necks. An excellent example of this, seen below is between the long necks of the Flamingo and the Swan – while the swan has up to 26 cervical vertebrae, the flamingo settles for a more modest 19 which are much more elongated and cylindrical in shape. Both achieve the same effect, but through different methods.

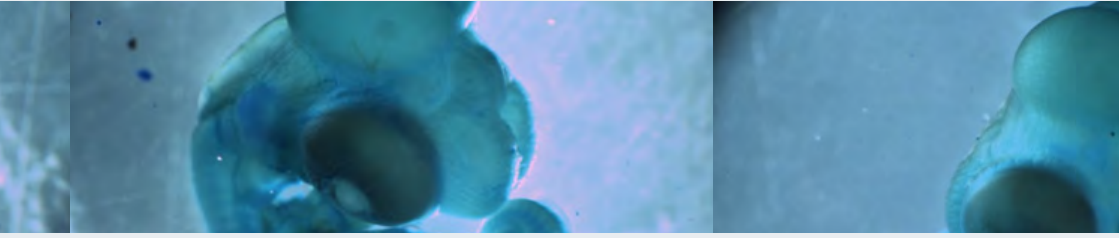
A promising theory as to why this is the case implies the existence of “developmental constraints” against mammals having variable numbers of cervical vertebrae (Narita & Kuratani, 2005). Perhaps mammalian individuals who have variable numbers of vertebrae may be very susceptible to certain pathologies at an early age and thus do not live long enough to reproduce – this eliminating them from the population without any environmental selection pressures. This is perhaps an extremely overlooked phenomenon which works in tandem alongside the classic theory of natural selection but is nonetheless a

relevant factor when looking at the context of evolutionary patterns.

### The Anomalies

In order to fully grasp why mammals only have 7 vertebrae; it is perhaps a good idea to look at outliers. Whilst variation of vertebral numbers is infrequent within populations of the same species, the homeotic transformation of the seventh cervical vertebra into the first thoracic vertebra is sometimes observed (e.g., Lebouck, 1898; Schulz, 61). As a result, there is one less cervical vertebra, and one extra thoracic vertebra. However, this phenomenon is actually closely linked with two pathologies: thoracic outlet syndrome, and early childhood cancer, the latter of which is more sinister (Schumacher et al., 1992; Anbazhagan and Raman, 1997). This is likely due to the fact that Hox genes possess more functions than previously thought; and supports the notion that not only are Hox gene mutations are linked to vertebral abnormalities but also a variety of different paediatric cancers (Corte et al., 1993; Lawrence et al., 1996; Manohar et al., 1996; Anbazhagan et al., 1997). Hence we can come to the conclusion that since such a trait can occur in populations yet is unable to establish itself, there are constraints and selective pressures against it. (Galis, F., 1999).

But what about the other “outliers” – our scaly and feathery cousins, the amniotes? One may ponder as to how birds and reptiles manage to avoid getting the sinister paediatric cancers that mammals develop as a result of altering their numbers of vertebrae. This is because the incidence of cancer within reptile and bird populations is remarkably low. Reptiles having much lower metabolic rates, and therefore experience low oxidative DNA damage (cf. Adelman et al.,



1988; Perez-Campo et al., 1998), and birds, although having relatively high metabolic rates, have very low free radical production and, as a result, undergo a low amount of oxidative damage (Perez-Campo, 1998). These protective mechanisms against cancer means these two groups can freely vary the number of cervical vertebrae without facing the consequences that mammals do.

With that being said, within the mammalian class, there are two exceptions to this rule: the sloth and the manatee (Bateson, 1894; Böhmer et al., 2018; Varela Lasheras et al., 2011). These mammals break the boundaries and overcome the cervical vertebrae number constraints in other mammalian species. This may be attributed to their low metabolic rate compared to other mammals (e.g., McNab 1988) and in a similar fashion to reptiles, it has been speculated that this is how these creatures are able to overcome the insidious consequences of recruiting extra cervical vertebrae through their low levels of

oxidative DNA damage (Adelman et al., 1988; Shigenaga and Ames, 1993).

It is remarkably interesting to consider how such minute changes within our very DNA can have a tremendous impact on our phenotype. As humans, many of us vary in looks and physical attributes, but ultimately share almost all of our DNA which is so very delicately crafted that even the slightest of changes at the wrong places can have catastrophic effects. Perhaps we, as students entering the medical field are too fixated on pathologies and cures and overlook the remarkable architecture of our bodies and how it is perfectly tuned thanks to millions of years of selection pressures and developmental constraints.

*With many thanks to Professor Anthony Graham.*

Due to page constraints, references are available on request to [gktgazette@kcl.ac.uk](mailto:gktgazette@kcl.ac.uk)



Skeleton of a swan (right) alongside the skeleton of a Flamingo (left) taken in the Museum of Life Sciences in the Hodgkin Building at Guy's Campus.





# Restless leg syndrome

Sammer Atta MBBS3

When it comes to medical conditions, perhaps the most overlooked of them all are the ones that occur within our sleep. Whilst there are many pathologies which may be a sign of insidious consequences to come such as REM Behavioural Disorder (RBD) which when isolated is the most robust non-motor predictor of developing Parkinson's Disease, as well as being a predictor of early cognitive impairment or other neurodegenerative conditions (Khawaja, I. et al., 2023), Restless Leg Syndrome poses no such threat but rather decreases the quality of life for those who experience it. The significance of this article, or rather this series, is to raise awareness of conditions that are rather prevalent but are seemingly overlooked within the medical community. Within this issue I will be exploring Restless Leg Syndrome, otherwise known as Willis-Ekbom disease.

We have all been in this situation. Sitting in the exam hall, having just finished your end of year exam, waiting for the invigilators to release you from the never-ending time capsule meticulously placed within the EXCEL centre. The smell of sweat, dusty devices and freedom fills the room as you lock in your final answer. You look up to check the time. The room is static, but an object in frantic motion stands out. Someone's legs! They jump up and down like a pendulum, ticking away as the countdown to the glorious summer break you promised yourself during those long, tedious revision sessions ensues. This could either be one's strings of emotion puppeteering their legs up and down in this intense setting, or perhaps a case of Restless Leg Syndrome...

With the short anecdote out of the way, let us explore the clinical side of the condition. The main symptom of the condition is nicely summarised in the name: restless legs! However, since this is a relatively vague description, I have compiled a variety of different descriptions of the symptoms as described by patients: legs feeling "twitchy", "uncomfortable", and even legs having an "urge to move" (Pacheco, D., 2018). As one may expect these are fairly unpleasant symptoms which can become increasingly annoying and disruptive. Interestingly this condition is often recognised as a sleep disorder due to its diurnal pattern: the symptoms get worse at night. This is also because it is heavily associated with involuntary jerking movements of the leg during sleep, hence resulting in sleep disturbances.

There are two distinct aetiologies of this condition: primary and secondary (Pratt DP., 2016). The former appears to be due to disorder within the CNS, and is a result of genetic inheritance (seeming to follow either an autosomal dominant or recessive pattern), while the latter is thought to be secondary to other conditions such as diabetes, renal failure, and iron deficiency (National Heart, Lung, and Blood Institute, 2000). The pathology behind the condition is thought to involve an imbalance of the dopaminergic system in the brain as well as the iron stores within the brain being diminished. Additionally certain electrolyte and micronutrient imbalances are thought to contribute to the disease, especially during pregnancy: interestingly it affects up to 1/3 of pregnant patients, with the symptoms disappearing soon after delivery (Prosperetti C, Manconi M., 2015).



It is often very difficult to truly understand a condition when you have not experienced it yourself. A fracture, for example, can be easily imagined - but the consequences and impact of it on one's life will certainly differ; this is most certainly the case between the patient and the clinician. We are often told, as medical students, that empathy is a vital skill to develop in our career, however it is incredibly difficult to truly put oneself in another's boots. Whilst things such as pain thresholds are the most obvious way in which patients experience the same condition differently, people's distinct daily ventures mean that changes in their health will uniquely impact the activities they partake in. This may accentuate the effect of the condition as it limits their capabilities in day-to-day life. While this condition may not seem life threatening, the impact it may have on someone's life may be more significant than one thinks. It is worth considering that often we view diseases as being purely biological, however this is not necessarily what interests the patient. It is the emotional distress that the condition builds up on the patient that should be explored; and the supportive measures are perhaps what we, as clinicians, should seek to offer.

Regardless of the cause, this condition may ultimately lead to a decreased quality of life for many patients as it may contribute to insomnia and ultimately lead to impaired daytime activity. Considering that 5-15% of the population are thought to have the condition, it is probably worth being aware of it as a clinician. So the next time a patient complains about a seemingly insignificant habit, do not be afraid to explore it further for there may be a manageable pathology

behind it that can make a big difference to the patient.

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# 9<sup>th</sup> NATIONAL UNDERGRADUATE CARDIOVASCULAR CONFERENCE

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## KCL X BUCA 9th National Undergraduate Cardiovascular Conference

Cansu Ozdemir MBBS3

On the 4th and 5th of March 2023, King’s College London hosted the 9th undergraduate cardiovascular conference in a hybrid fashion: both online and at our very own Guy’s Campus. This year, the KCL Cardiovascular Society has had the honour of collaborating with The British Cardiovascular Association (BUCA), who hold an annual cardiovascular conference for undergraduate medical students and hosted over 120 students.

Day 1 left us feeling inspired after tuning in to a range of varied talks, all from highly regarded cardiologists and vascular surgeons around the globe. We were fortunate enough to host clinicians who have worked in a plethora of fields, ranging from intensive care to electrophysiology, from military medicine to paediatric congenital heart surgery. The budding cardiologists were brought together from all over the UK, with the students travelling from Oxford, Bristol, Dundee and Leicester to name a few.

It was important to ensure that cardiology,

which stereotypically is notoriously known as a competitive, male-dominated and cut-throat speciality, felt like a welcoming and inviting field to the delegates. To try to get rid of this stereotype, we made sure to invite doctors determined to break this mould, including talks from the Women in Cardiology branch of the British Cardiovascular Society, highlighting their own initiatives to break the stigma. Whilst we are on the topic of inspiring women, day 1 also allowed us to hear from Miss Claire Webster, squadron leader in the Royal Airforce and Vascular Surgeon at Guy’s and St Thomas’. She explained to the delegates about what a career within military medicine consists of and the importance of extracurricular activities and incorporating them into your future careers.

The College warmly welcomed Dr Theshanka Amarsinghe, a GP and the Founder of KCL Cardiosoc to speak to us about her time at university and what her journey within medicine has been like. We were all excited to hear about her time throughout medical school



workshops, including Biosense Webster, Medtronic and more. The aim was to get students up to date with how the attractive technology can be incorporated within surgical procedures such as inserting pacemakers, the use of virtual reality (VR) headsets for anatomy teaching and catheter ablation within the labs.

An interactive, point-of-care cardiac ultrasound workshop was run by Dr Soliman-Aboumarie, a consultant in Cardiothoracic Intensive Care at the Royal Brompton. This was a fantastic opportunity for the students to get hands-on with the ultrasound machinery, especially as it rarely features in the medical school curriculum!

We made sure to keep the budding surgeons on their toes with a practical workshop on vascular anastomosis in our labs. This was led by Mr Habib Khan, a consultant cardiothoracic surgeon at King's College Hospital and gave the opportunity for students to practice the how to suture vessels together and understand the clinical significance of this vascular procedure.

It wouldn't be a KCL conference without a CV building and critical analysis workshop! These were kindly run by Dr Laskar, a senior cardiologist registrar at St Bartholomew's Hospital and Dr Ganesananthan, an Academic Foundation Doctor at Imperial College London. The workshops aimed to provide everyone with the crucial knowledge on how to build your portfolio during medical school years and also how to interpret a paper, which is a significant skill that requires practice to perfect.

Overall, our national conference was a huge success, with a majority of the delegates deciding that they would consider a career within cardiology for the future. Our conference aimed to showcase what the world of cardiology has to offer, and the extensively positive feedback we received suggests that we managed to successfully do this.

The goal was to showcase the wide variety of sub-specialities and career types that exist to treat the heart and vessels and that there is a place within cardiology for everyone. We thank all of the delegates who attended the 9th National Undergraduate Cardiovascular Conference and look forward to inviting you all again next year!

and where her career had led her since her departure from GKT and venturing into GP land.

We had many thought-provoking abstracts submitted for the national conference, with the top rated 4 submissions presenting their amazing work over zoom on day 1. Listening to a wide breadth of cardiovascular research done by our medical school peers left us inspired to take part in more research and keep up to date with the latest advances within the field.

Day 2 was the day of our interactive workshops, filled with opportunities to find out more about devices used within cardiology, from Dr Shabeeh and his team. Artificial Intelligence (AI) is an area that we can't ignore, with the boom in med-tech undoubtedly altering our future careers by the day. To keep up to date with this, our conference hosted multiple medical technology companies for the



# Lifestyle Medicine Conference KCL & UCL 2023

Aliyah Malik **Lifestyle Medicine Society President**

A new type of prescription and lifestyle as the future of medicine.

**“Health is Not Valued Until Sickness Comes”  
Thomas Fuller.**

What comes to your mind when you first think of medicine and healthcare? Unwell people, hospital beds and prescription pills. Helping people when they get sick is seen as the core principle of doctors and other healthcare professionals. But what if there was another way to practice medicine? A new method which taught patients how to recognise signs and symptoms of poor health and empowered them with the tools to promote better health. Moving away from the traditional authoritative and patriarchal way of medical practice and towards a partnership whereby patients feel confident to take charge of their own health.

Lifestyle medicine includes pillars such as mental wellbeing, relationships, sleep, nutrition, and physical activity. Educating patients on ways to improve these aspects of their life is a key component of lifestyle medicine. Our goal as a society is to encourage students to reflect on how they can improve their own health as well as promoting aspects of preventative medicine that they may use in the future with their own patients.

On March 22nd, 2023, we partnered with UCL

Lifestyle Medicine Society and hosted a conference: A Holistic Approach to Patient Care. The event comprised of three separate talks with different speakers. Dr Natalie Chua, a clinical psychologist delivered a talk on mental health covering the key differences between medical and holistic models as well as practical ways to improve mental health. Marilia Chamon, a gut health nutritionist, shared her experience working with clients and how we can eat for better energy and focus. Dr Kai Koch, Emergency Doctor with special interest in Sport and Exercise Medicine, delivered an interactive talk on the benefits of physical activity. The conference was kindly sponsored by “The Gut Stuff” and we offered guests their gut friendly bars.

We chose to open the event to everyone, and we had students from different courses attend as well as sixth formers interested in applying to medicine. It was wonderful to see so many people interested in learning more about the power of lifestyle.

We are committed to the lifestyle medicine movement, and we will be hosting more events like this in the future, and we welcome everyone to attend. Don't wait to get sick to value your health!



# 10th Annual National Student Psychiatry Conference Back To Its Home With Kcl Psych Soc

Ali Gibson **Co-President of KCL Psych Soc 2022/23**  
and Conference Lead for the 10th Annual NSPC

Back in 2013, the team at the recently established KCL Psychiatry Society had an idea – that there should be a student conference focusing on psychiatry, as there was for other specialties. Their plans led them to take over the IoPPN in February 2013 and lead the inaugural conference that has since been held across the UK, each year taken over by a different Psychiatry Society across the UK, and formally overseen by the Royal College of Psychiatrists.

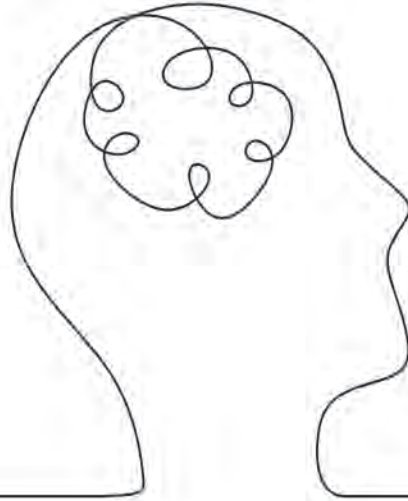
Fast forward to April 2022, and I sit in the social media team of today's KCL Psych Soc where an idea is emerging. The conference turns 10 years old next year, so if there was ever a crucial time to bid to hold the conference again, it's now. Brainstorming meetings turn into an ambitious programme looking 10 Years Back, 10 Years Forward at the recent history and potential future of psychiatry as a specialty, and giving time to zero in on student psychiatry as an area of development and potential over that time. And lo and behold, in June 2022 we win the bid.

As we develop the conference, it becomes even more intriguing – our keynotes range across military psychiatrist, psychiatry in the USA, mental health research, student and foundation doctor mental health, developing psychiatric care in international crises settings, and psychiatry in humanities. Student group and project spotlights showcase projects into outreach for prospective medical students, early exposure to clinical practice and psychiatric knowledge development within medical school, the expanding research and understanding into psychedelics for clinical practice and factors impacting on medical students' mental health and wellbeing. Over 40 speakers and breakout room contributors join us on the 4th & 5th of February 2023, from medical students to lived experience patient ed-

ucators and trainee and consultant psychiatrists. With them, we welcome 100 attendees across the two days to the RCPsych headquarters near Tower Bridge, from all over the UK.

The conference itself was a blast – every speaker was exceptional and brought an entirely fresh new perspective to the overarching discussion about past or future developments or challenges within Psychiatry. The organisational team were commended highly in the feedback for which 100% respondents rated the organisation 'Well organised' or better (Likert 4/5). Attendees reported having their minds opened to previously undiscovered areas of psychiatry such as military psychiatry or humanities in or around psychiatry. Our lived experience contributors, talking about distress, recovery and/or understanding mental health and illness was enlightening for many attendees, and was an essential consideration for us that we don't solely centre on our side of psychiatric care.

KCL and GKT are known of being a home for emerging psychiatric research and understanding, and cutting-edge care. What we hope this conference achieved is solidifying GKT's place as an extraordinary provider of education and perspectives on psychiatry. Passionate students 10 years on from those who paved the way in the conference's conception coordinated an exceptional group of leaders, care providers and speaker in mental health care. There was also an outright commitment to financial accessibility prioritised, as all travel and accommodation where requested (no evidence needed) was covered by KCL Psych Soc with financial backing from the IoPPN – we are immensely grateful for their support to ensure as many people who wanted to attend could.



Many of our core team, including the two Co-Presidents have been nominated for RCPsych London Division Medical Student of the Year, as a consequence of all of the work they've put in to developing student psychiatry, undeniably including the effort and success of the conference. We're also very grateful to have received the GKT MSA's Event/Initiative of the Year award at the Blues & Shields Awards Ceremony, recognising the impact this event has had on the reputation of GKT and the opportunities available to its students.

Our thanks to Dr Mandip Jheeta, Dr Joanna Cranshaw & Dr Kieron Kumar, all previous or current Ed Fellows at the IoPPN/SLaM who helped us work through speaker drop outs and post-bid planning. To Dr Charlotte Wilson-Jones, thank you for being a continual advocate for us and supporting the conference through a talk, but also championing us all the way! To my fellow conference team, Emma Cook & Valerie Cai, thank you for helping me work through the difficulties and devel-

oping and delivering an exceptional event. To Hayley Shaw and Clare Wynn-Mackenzie of the Royal College of Psychiatrists, thank you for the endless support and deadline checking/ updating that kept me on the right path and meant sure we had a conference in the end! To the catering, AV, operations and security teams of the RCPsych, thank you for running a fabulously smooth and worry-free service for the entire event (and apologies for pinching your weekend!) To the wider KCL Psych Soc team, thanks for getting stuck in over the duration of the conference and being our extra hands where we needed them. And to all of our speakers and attendees – we literally couldn't have done it without you. Thank you!



# Royal College of Nursing strikes at Guy's Hospital, February 6th 2023





# Reinventing Healthcare: Embracing the ChatGPT revolution

Rhea Sibal **MBBS3**

The practice of medicine is an art - where a physician explores many layers of complexity before making a decision. The media is saturated with interesting - and opinionated - articles regarding the integration of ChatGPT in the medical world. For the small percentage of you who are unaware, ChatGPT is your 'friendly neighborhood' chatbot that can engage in human-like conversations, answer questions and help in scouring the web.

The inherently human nature of medicine, coupled with its gross complexities on a real-world scale, makes integrating AI tools a highly difficult process, where an AI expert must consider not only the potential positive results, but also the downsides that can come with such technology.

In 2022, the release of OpenAI's formidable 'ChatGPT' (1) has prompted many to ponder over the future implications of this groundbreaking technology in the field of practicing medicine from a patient's and healthcare provider's perspective. From a medical student's perspective, I, amongst my peers, have integrated this supplementary chatbot aid into my daily studying routine, due to its efficiency and ability to create study question sets, clarify physiology concepts (especially the Year 1 material!) and help with summarizing pages of transcripts. Medical diagnosis, EHR (electronic-health records) and patient communication are just a handful of the areas that AI experts foresee huge growth in. After news came that the tool successfully passed the United States Medical Licensing Exam (2), it has come into play in proposing diagnoses, managing clinical data from large research trials and reducing paper-

work demand for doctors. In the current NHS crisis, compounded with soaring US healthcare prices, this format of a virtual cost-effective tool is very appealing to healthcare providers, exemplified by the inauguration of Babylon's Health Chatbot (3). This Chatbot serves to gather information about a patient's symptoms, health questions and concerns and generate comprehensive advice regarding a diagnosis and medication reviews.

Researchers at Harvard Medical School (4) have found the tool able to list adequate steps of management of hypothetical patient scenarios and show radiological decision-making in the process of screening patients with breast cancer. In the realm of telemedicine, this AI tool can propel the shift to remote healthcare, by acting as the 'virtual assistant'. Presenting complex medical information using simple jargon for a patient to take onboard, is understandably sought after.

Whilst it is important to fully appreciate this technology, we must simultaneously acknowledge the profound challenges that come alongside this venture. Specialties like psychiatry (among many others) fields may suffer under the bombardment of tools like ChatGPT. Despite its advanced language processing capabilities, it is unable to make intricate connections in a patient's history of mental health, and it cannot comprehend subtle nuances including verbal and non-verbal cues. These are pivotal for a doctor to create a whole picture of the patient's presenting complaints and assessing a patient's mental capacity.

The most obvious risk is that this AI system



could malfunction unexpectedly, posing a grave threat. Even 'minor glitches' in software or hardware can have a catastrophic effect on a multitude of patients (5). Data confidentiality and privacy concerns leave many experts questioning the use of ChatGPT, particularly about cloud-based storage systems and various third-party vendors. Additionally, it is becoming increasingly difficult to set boundaries with AI, especially when it comes to ethics guidelines and regulations. If ChatGPT were to make an error in diagnosis causing harm to a patient, who should take responsibility? Is it just to put blame on the clinician for advocating its use?

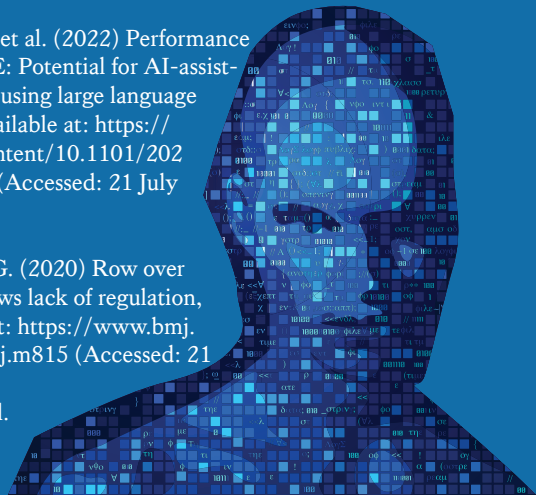
What is important as of now, is to embrace this digitalization, try and use this tool to better our own productivity, and empower clinicians to perform the best at what they already do. Such intricacies of medicine are something AI cannot replicate, thus displaying the exigency of physicians for now, and for many decades to come.

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# Infertility: The Personal and the Philosophical

Zara Hussein MBBS3

Research has shown that women dealing with infertility have depression and anxiety levels similar to those with cancer, HIV and heart disease. One in seven couples in Britain has trouble conceiving a child, and the depth of struggle experienced by some of those unable to have children the normal way was something I didn't truly appreciate until I met Mary\*. I had attended my hospital placement as per usual on a Friday and was making my way out the lift when I saw a young woman who looked a little lost. I asked her if she was alright or if she needed any help with directions, and to my surprise she burst into tears. I took the opportunity to sit her down and offer her some tissues. This encounter opened up a conversation that has greatly impacted me and has enriched my perspective on the issue of infertility, IVF, and the ability to become a parent.

Mary had just been to the hospital to visit her mother who was suffering from late stage liver cancer and did not have much longer to live, as I was told. She had been visiting her mother every day, spending hours by her bedside, but despite this she felt that she could never feel truly present and connected to her dying mother due to the fact that she felt like a failure for not being able to have a child of her own. Mary shared with me that she had been diagnosed with premature ovarian failure, and as a result of this she had discovered that she was infertile. She came from a big Jewish family and had become accustomed to all of her siblings having children and had spent the last few years watching the many grandchildren of the family bonding with their grandparents. Family was so important to her, but her inability to be part of that had left her feeling isolated and hopeless.

She and her partner had already qualified for a cycle of IVF on the NHS but the procedure had not gone to plan, as she had feared. I realised just how valid this fear might be, given that the IVF success rate for women under 35 is 32%, a rate that continues to significantly decline with maternal age.

The current principle stands that those who qualify are entitled to one cycle of IVF on the NHS but any further cycles must be paid for by the patient, with costs nearing £5,000 per cycle. Mary, who worked as a teaching assistant in a nearby nursery, explained that despite how desperately she wanted to have a baby of her own she could not afford to try again. She reasoned that even if she saved up it would take her a couple of years to have the disposable income to put towards this, and by that point her chances would be even lower. She felt hopeless.

This really made me think about what it must be like to be deprived of the one thing that you want most in the world. After all, having children is something that our fundamental biology programmes us to crave. I also began to think about the apparent unfairness of how the simple fact of being able to afford IVF could spare the kind of pain that Mary seemed to be suffering with every day, to the point where she could not face her dying mother without feeling the shame that she described.

I reflected on this for some time after I left Mary that day. I began to think about the concept of a 'right to have a child'. When we tend to think about these issues, IVF and assisted birth seems to fall heavily into the medical domain, but actually there is a good case to be made for the fact that it is much more of a philosophical quandary than you might expect. The fact that



Mary was able to have her one round of IVF on the NHS arguably presumes the idea that her inability to have a child was a medical problem that the NHS is there to treat. So, theoretically, infertility is a malfunction that the medical profession should seek to remedy. I instinctively began to draw parallels with the way the NHS was dealing with the condition of Mary's mother - a cancer that required drugs, scans, treatment and care that one would reasonably assume to cost more than the couple of IVF cycles more that Mary would need to have a good statistical chance of conceiving.

I felt entirely stumped by this comparison. These were questions that I couldn't find answers for by studying medicine any harder. These questions seemed to be distinctly philosophical in my mind. Mary's palpable anguish made me acutely aware that the ability to have children is enormously significant to the human experience for so many of us. For a medical 'deficiency' so common, and so physically and psychologically significant for many, some might say that infertility should be treated in the same way that we treat other diseases and malfunctions of health.

In 2021 the NHS spent £2.8 billion on malignant disease and immunosuppression, comprising 16.3% of its total spend. It is common knowledge that cancer drugs are expensive, but the concept of our healthcare system halting treatment after a round of chemotherapy because it is too expensive is not something we have to think about, because it is not a problem we often have to encounter. The prized principle upheld by the NHS is that the best interest of the patient is the primary factor in every clinical decision made, but what about Mary?

From my short encounter with Mary, I could get a real sense of how much of a difference it would make for her to have a proper shot at the IVF. Her physical and mental health as a result of her premature ovarian insufficiency and resultant infertility would no longer pose such a great threat to her wellbeing. I am very aware that there are a vast number of logistical factors that play a major role in how the NHS has currently set its stance on the matter. However, I feel that a philosophical approach to issues such as this - issues that are bound by real world limitations - may help to expand our thinking and perhaps influence how we, and future generations, approach our healthcare.

\*For patient confidentiality purposes I have used a different name.

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# The Age of Artificial Intelligence

Noor Amir Khan MBBS1

I am sure the subject of Artificial Intelligence (AI) needs no introduction. Scattered across newspapers, conversations and social media, its emergence has been plagued by contradictions: hope and fear, innovation and dependency, a new beginning (or perhaps an end). The purpose of this article, however, is not to promote fear-mongering, nor advertise the onset of a utopia but, instead, to explore how Artificial Intelligence affects us: from university students to professionals.

My personal interest was piqued by the immersion of AI into both creative and academic spaces. As the fruits of its labour won first place in photography competitions and amplified students' grades across the world, I wanted to take this opportunity to investigate the intersection between art, education and Artificial Intelligence, through use of OpenAI's ChatGPT-3, further.

I began my experiment by writing a poem. Whilst not as methodical, calculated or objective as your average assignment, it has already been established that ChatGPT can convey information faster than the flick of a switch. But to what extent can it execute an abstract idea in a compelling way? This creative process is, arguably, at the heart of any essay. I wanted to put ChatGPT to its limits and hence, took this approach with poetry as my medium. After writing my piece, I created the following highly specific prompt based on its form, structure and central message:

"Write a 6 lined poem in free verse (no rhyme

scheme) regarding how nostalgia can change how we view our memories? Use the crystallisation of oil within one's skull as a metaphor." Here are the results after inputting the prompt into ChatGPT-3. Which poem do YOU think was created by a human – and which by AI?

## POEM 1:

Is it not strange that the silent tears of old,  
Become wistful reflections by the new?  
When lived, the pallid melancholy  
is swallowed by the murky grease of saturated  
colour,  
Until the treacle fills the crannies,  
Crystallising to form new notches and secret  
recesses within the skeletal cave.

## POEM 2:

In the chambers of memory, a transformation  
takes hold,  
Nostalgia's touch, like crystallised oil, unfolds.  
The past, once fluid, now solidifies with time,  
Shaping our recollections, in a rhythm sublime.  
Each memory, a prism, refracting truth's light,  
In nostalgia's embrace, perceptions take flight.

In a survey of 44 individuals, mainly consisting of university students at Guys Campus, 18 (40.9%) were correct: the first poem was written by myself, whereas the second was written by AI. In retrospect, sampling individuals with a larger variety in age, field of study and educational background may have yielded more representative results.

Nevertheless, after speaking to the participants regarding their reasoning, I realised that many of the responses rested upon how advanced and accurate they believed ChatGPT to be. The majority expected AI to provide a 'more complex' answer that obeyed every aspect of the command and was 'more difficult to follow'. Interestingly, this was at loggerheads with the final outcome as ChatGPT-3 was not able to adhere to the free verse instruction, therefore suggesting that it is not as perfect as it may seem! Upon further research, this makes sense as large language models (LLMs) produce their response through a divide-and-conquer approach. As the AI cannot process words, the input is broken down into sets of characters that are often featured together. These so-called 'tokens' are assigned numbers and placed into a 'meaning space' where they are interpreted through a set of defined synonyms. Whilst somewhat unpredictable, LLMs generally create their outputs through lining up tokens which have the highest probability of being correct. With ChatGPT-3 possessing a dictionary of 50,257 tokens, it is understandable that inaccuracies may be present as a result. [1]

The question of which creative work was 'more human' also arose. Whilst limited by the question of what it means to be human at the outset, answers were determined by the 'flow', emotional underpinnings and extent of meaning conveyed. In the end, opinions were fiercely mixed and used to justify decisions on either side. Regardless, you get out of the platform what you put into it; the more specific and creative the command on behalf of the user, the more indiscernible the result.

Alongside its introduction into student-life, AI has already taken root within the medical landscape. From its use in discovering antibiotic solutions for superbugs within hours, [2] to the PMcardio App that supposedly detects ST-elevation myocardial infarctions (STEMIs) 31% more accurately than cardiologists [3], it is clear that AI is here to stay. But, does the same apply to human influence in the medical field?

The scenarios above both portray AI's crucial advantage – resource allocation. Whether

time or money, using algorithms and machine learning decreases decision-making, human error and cost. In an overworked NHS where doctors spend approximately 49.2% of their day on the EHR and paperwork [4], delegating these tasks to AI can leave more room for time with patients. It can also be applied to decrease A&E waiting times by increasing accessibility to high quality medical advice, therefore preventing conditions from escalating to emergency settings. This could be particularly useful in areas with language and educational barriers. But is it really this simple? Enter the 'Black Box Dilemma': how can we trust the decisions made by algorithms when we don't understand the code behind them? [5] On a broader scale, if the datasets used to train large learning models are of insufficient quality and quantity for patients from marginalised groups, the systemic biases permeating our healthcare system can be transmitted, if not exaggerated. [6]

In a nutshell, if exhaustively scrutinised and developed with the help of experts across specialties, computer scientists and ethical committees, AI has the potential to improve our NHS. [7] Perhaps that's the answer: AI has *potential*. If used as a crutch, it can lead to dependency, loss of creativity and curiosity for professionals, as well as a mechanical patient experience that affects healthcare outcomes. [8] But, if used as a supplement, as a means of accessing new perspectives, it can bring us further. In the AI Age, we need to learn how to effectively converse with Artificial Intelligence, engage with its ideas, be critical and take on what's needed to spur our own forward. I recognise that, in a time where comfort and maximising efficiency are prioritised, this is difficult. But, by taking the time to understand how AI makes its decisions, it can help us come closer to perfecting our own. As I sign off, I leave one last question for you: who wrote this article – a human or an AI?

Due to page constraints, references are available on request at [gktgazette@kcl.ac.uk](mailto:gktgazette@kcl.ac.uk)



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# Arts & Culture

*Photo: Guy's Gazette, Volume 106 No 2422 - May 199, Featuring Viscount Nuffield during RAG week*



# On Art & Healing

Zaynah Khan **MBBS3**





Cave Painting, Dance Scene



Sulawesi Cave Paintings

The art of healing. Or the art in healing. We have so many creative methods we use to provide care for ourselves and others. It is often the creative process that provides us with transformative respite. Compassion and creativity go hand in hand and have been central to our experiences as humans for as long as we have been here.

The first instance of recorded human art that we have found, dates to approximately 40,000 years ago: the Sulawesi Cave paintings. From the beginning, we have used art to understand our emotions, express ourselves, and articulate them to others to share in our joint sphere of existence.

The sense of community, consideration, and care in the creation of art has long been familiar too. Archaeological studies show that Stone-Age toddlers

had art lessons, with finger paintings and hand stencils found on ceilings in the Dordogne Cave 13,000 years ago. Jess Cooney, an archaeologist, suggests that in analysing the ceiling paintings of toddlers' hands, they couldn't have been made alone; they would have had to be "held up" or "sitting on someone's shoulders" to create them. Even in the Palaeolithic Age, art can be seen as a shared human experience that encourages us to lean on each other's shoulders for support. Quite literally, in this cave, I mean- case!

As we think of archaeological and anthropological links to the past, let us reflect on how Medicine fits into this. Margaret Mead, an

anthropologist, was once asked what the earliest sign of civilisation was. Her answer was "a healed femur," tracing back to 15,000 years ago. She suggests someone would have had to "stay with the one who fell" and "carry the person to safety." How incredible that the first recorded actions of 'humanity' is steeped in helping and healing another in distress.

Today, arts and creative therapies are used as forms of holistic care. Through visual art, music, drama, and other creative forms of therapy, people can find methods of articulating difficult thoughts and experiences, and make excruciat-

ing, or chronic pain feel more bearable. Under the NHS, these therapies can be used to help manage people's experiences of many conditions like psychosis or PTSD. In many people's lived experiences, art and healing are inextricably linked.

It is through creativity and art that we find an understanding of ourselves and a sense of belonging with others, which, in difficult times, provides us with a scope for healing. In his Ted Talk 'Give yourself permission to be creative,' actor Ethan Hawke emphasises that creativity is not just something "warm" or "pleasant", but that "it's vital." "It's the way we heal each other" in "starting a dialogue," where "the healing happens, and we come out of our corners, and we start to witness each other's common humanity."

Art can also be used to process emotions and

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**“art can be seen as a shared  
human experience that  
encourages us to lean on each  
other’s shoulders”**

---



preserve memories of our beautiful experiences. One such example is Alexei Leonov, a cosmonaut, artist, and the first man to walk in space. On his 1965 mission, he witnessed an orbital sunrise which “changed his vision of space and time.” He captured the sunrise immediately in a drawing, while in space with coloured pencils he took with him. In experiencing such a phenomenon, he had to illustrate his experience by capturing it in his way. He transformed this ephemeral experience into the first piece of human-made art created in space too. The phrase ‘art imitates life’ strikes me, in such an evanescent experience as being the first to walk in space, creating art was the best way to process the moment.

John Green, in his book *The Anthropocene Reviewed*, said “The art and its viewer or reader make meaning together in a collaboration that transcends time and space.” If you go on to capture moments throughout this term that you’d like to share and “make meaning together”, feel free to share them with us at the GKT Gazette!

However, this is not my message to you today. Create art for you. To get to know yourself. To get to express yourself. My message is that creative rest is essential and crucial for us to feel good. Dr Sandra Dalton-Smith suggests that there are 7 types of rest to avoid burnout: creative rest being one of them. In high-pressure, stressful environments that often foster academic and occupational burn-out, I implore you to nurture your “scope of imagination,” as (one of my favourite characters) Anne Shirley-Cuthbert would say.

Take walks in nature, doodle on the corner of your lecture slides, capture sunsets in your BeReal., write disjointed thoughts and poems in your Notes app, take shaky videos of the moon on your way home, make Pinterest boards for your niche interests, keep track of the flowers you see on your daily commute, journal your unassuming thoughts even on the most seemingly mundane days. Creativity is not exclusively a talent for people other than yourself. Nor is its purpose to produce a perfect masterpiece. Creativity can

be an act of self-compassion and healing, akin to medical treatment, but also as self-care. Even in the banality of academic or career-driven stresses, I hope you can find ways to discover small joys every day and, as Henry David Thoreau said, “live deliberately.”

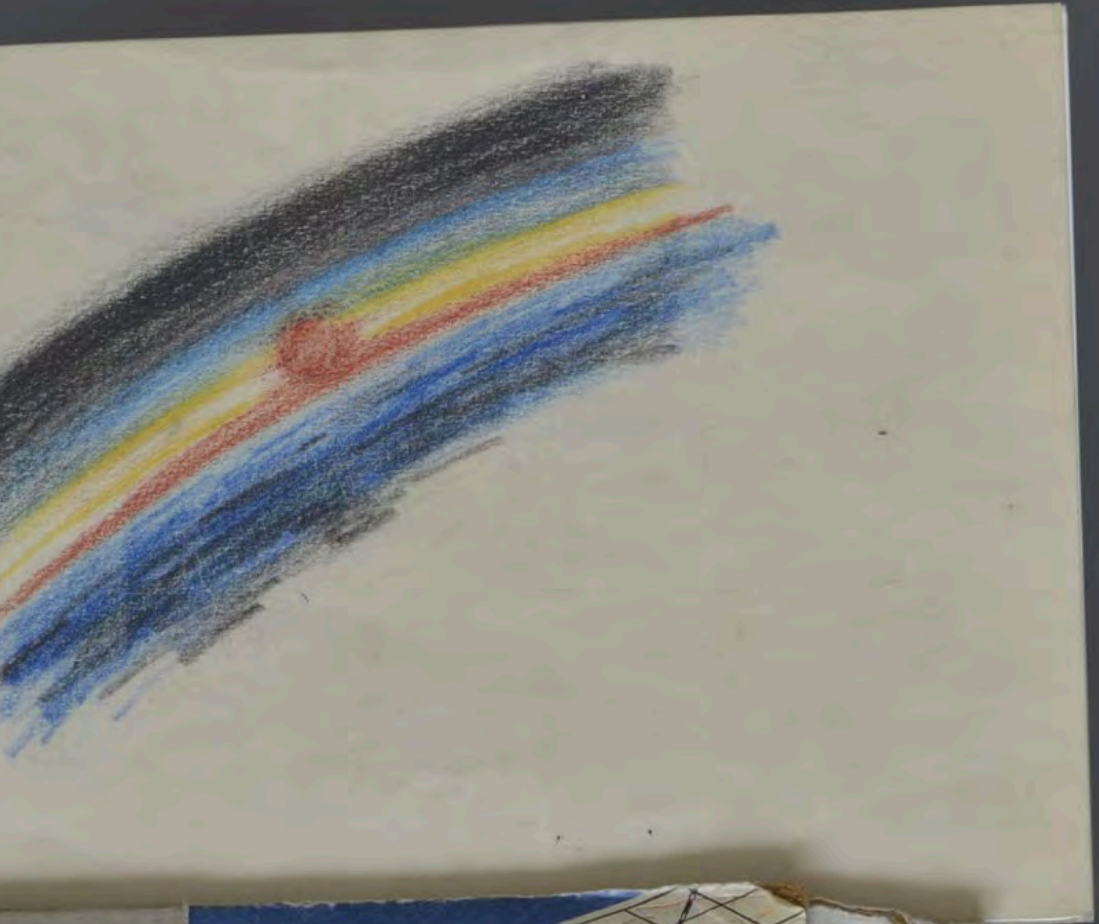
So, I leave you with a final message inspired by my favourite movie: *Dead Poets Society*, (in which Robin Williams plays English Teacher “John Keating,” inspired by our very own Keats):

Carpe Diem! Seize the day! Make your lives extraordinary (even in just revelling in the ordinary!)

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**Right: Orbital Sunrise, Alexei Leonov- 1st draft**





# Make the Prof Sing

## An Interview with Professor James Clark

Morgan Bailey **MBBS3**

Music, unlike other languages, can transcend borders, cultural boundaries and continents with ease. Thus, it is that music at King's is not relegated to play a self-auditory symphony in the bowels of the Strand campus: look at our GKT Music Society, composed of medics performing and composing music in lieu of their medical or bioscience or allied health professional degrees.

Talented and as multi-faceted as us Guy's people may be, we must not assume music to remain a hobby *in perpetuum*. To discuss this, Professor James Clark, Head of the Physiology Teaching Department & part-musician, took time away from his keyboard so I could impart his wisdom onto mine.

### ABOUT THE PROF

Prof Clark is widely known to our teachers in the Faculty of Life Science of Medicine. In February 2020, Prof became the self-proclaimed "digital education guru" once he was appointed as one of many leads in digital education at the Faculty of Life Science and Medicine. It did not take long for Prof Clark to comment on the "whole ordeal" of Teams teaching, as we went into a lockdown a singular month later, calling it "soul destroying". Like your favourite SFJAZZCOLLECTIVE album or Rachmaninov piano concerto, you just cannot beat the real thing.

Much like our esteemed Prof Ellis, Dr Papachristidou or Dr Hunter – Prof Clark is a born teacher. Proudly orating, as head of the physiology department, "all your teaching comes via me". Before his current post though, Prof Clark was a reader in Aerospace Physiology, before jettisoning the aerospace in the title

as he "was not a space man". Further yet, rising up as a post-doctoral researcher, working with Professor Michael Marber (although, Prof Clark once nearly worked post-doctorally in "optimising milk production" in Edinburgh, but was unsuccessful).

As we rewound the tape it became clear that, despite the extensive scientific background, Prof would always revisit a singular tenet in his life – music. So much so that things could have been very different for him. As he states: "At age 13 or 14, you have to make lifechanging decisions about which subjects you would like to take [at GCSE]." – Not much has changed – "I had to choose between biology and music... I chose biology... had I not – who knows – I could have been on X-Factor... losing!"

I could not help but resonate with this experience: having to give up my precious AS level in Music because it occurred simultaneously with Chemistry. Had I given up chemistry, perhaps I would be singing a different tune of life? These decisions are almost universally regarded as one of the pathologies in the education system: one in which has been reignited at recent news of the divide in educational outcomes at GCSE and A-Level between the North and South of England in 2023.

### MUSIC AND CAREER

For 25 years, Prof Clark had SCUBA dived for UCL (boo) – then Imperial, then King's. Indeed, Prof's first experience of King's, before working here, was in the dive club. I suppose becoming a reader in aerospace physiology made sense – the parallels in physiology of the



Listen to the covers album!



Listen to the 2023 album!

immense pressure gradients of air or water vacuums are second to none.

Although Prof managed to combine his hobby for SCUBA diving with his work, the music was sadly side-lined – “...if I could include music in my job, I would.”

Earlier in his career, he spent years developing a successful commercial music production studio for a large stretch of his early career. And as studio engineer, he became the expert on “where the microphone leads were” - ringing familiar bells to us medical and nursing students - otherwise known as the professional curtain closers and ECG lead fetchers.

The fact that music no longer forms cruciality in his career, of course, does not stop Prof Clark engaging with students through the musical language. For the past 2 years, Prof has published a Christmas Covers Album which can be heard in the King’s Christmas message from Professor Shitij Kapur, featuring the (unlikely) voices of Dr Jolley and Professor Michael Shattock – familiar faces in the School of Medicine at GKT and in the wider GKT community.

Christmas may only come around once a year, but for 2023, Prof has gifted us with high-quality self-made cover songs requested by students. His goal of 24 songs this year of 2023 is well underway. I wish him the best of luck producing said songs by December.

## DESERT ISLAND DISCS

It came to the point in the interview where I was to tread very close to intellectual property law, by asking Prof his ‘desert island discs’. Without giving away Prof’s years, “growing up with the emergence of electronic music” had an incredible influence on his choices below.

The first being classic electronica – “think Oxygene by Jean-Michel Jarre”.

Second would be Phil Collins’ No Jacket Required.

Finally, Prof apologised, before selecting his third choice:

“I would take some of the stuff I have recorded...”

I certainly agree that in ‘desert island journals’, the Gazette Volume 133 would be one of my choices!

## FINAL REMARKS

Professor James Clark is a teacher by trade, but a musician at heart. Balancing his “60-70 hour a week job” can prove difficult: “everything has to get done... lectures have to happen”. On occasion, Prof might have given your lecture, almost accidentally: “if someone is off sick... you may have to walk into the lecture theatre. Your first question is: You’re dentists? OK – let’s make this lecture dentist orientated”. The immense skill and courage for our lecturers at King’s and GKT, to read the slides the morning of someone else’s lecture and to deliver it with such confidence, is to be admired.

Delivering a world-class physiology teaching is one thing: Prof Clark was an instrumental player in strong-arming GKT in bringing back physiology practicals for medical students, which sadly I had missed in my 1st year. As the interview drew to a close, Prof paid tribute to the “incredibly passionate and talented individuals within the physiology teaching department”. This sentiment radiated through the screen – and I could not help but agree. Although the keyboard clickety-clack came to close on this final paragraph, Prof Clark’s piano keyboard is far away from writing its final measure.

*I thank Professor James Clark in taking the time in speaking with me and for allowing us to transcribe his words of wisdom onto these pages.*

Link to Cover Album: <https://bit.ly/JCCovers>  
Link to 2023 Songs: <https://bit.ly/2023tracks>



# The Arts & Medicine: A Dialogue

In conversation with Dr Sukey Parnell Johnson

Zaynah Khan **MBBS3**

## An Introduction

It's difficult to encapsulate what Dr Sukey Parnell Johnson does, succinctly. To oversimplify, Sukey is an Actress, an Artist focusing on portraiture "I make photos, I don't take them", and a Lecturer- whom I had the pleasure of meeting as one of my supervisors for the Medicine and Art SSC. I sat down with Sukey to explore the importance of the arts and their role in medicine.

## What do we gain from the Arts & Humanities?

For me, there has always been an equilibrium between the arts and humanities and the sciences. Medicine and science help me to understand the processes behind things whilst the arts and humanities help me connect to people and know what things are important and why. I think that's where empathy is built in.

Sukey also suggests that it helps us to build

together the bigger picture. "It helps you to have your own research to make original connections yourself." It enables us to bring together that we can't do on paper. "When you're in the room, you're picking up on things that are non-verbal and all sorts of other things that are happening that are part and parcel to an individual. And you have to treat an individual person." It helps you build a better understanding of the whole person in front of you, and the many facets of their life, that help you come to a plan best suited for them, with them. "Treating that holism, I think gives us more access to be able to make connections and articulate them with people who are different from ourselves and gives us creative opportunities to work out those dialogues." So, in exploring the arts, we are given a safe space to experiment and make those associations which enable us to connect to information differently ourselves.

During the conversation, we discussed some of Sukey's past projects. Here is an overview



Photo by Sukey Parnell Johnson  
[www.sukeyparnell.com](http://www.sukeyparnell.com)  
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of a couple. In her most recent endeavour, The Apple Tree Project, Sukey created a dialogue, collaborating and co-creating a project with people with memory problems. In collecting, curating, and moving around their images, and in starting the conversation, Sukey worked together with them to connect memories and create a meaningful experience.

Through her project for her MA, Women of an Uncertain Age, Sukey helps bring women in mid-life, of whom “no one seemed to be talking about,” to the forefront. In creating portraits of women in transitional ageing periods, Sukey helps to find beauty in the experience of ageing as a woman, where there is so little representation in a society that fixates on remaining young.

“The arts help bring back a sense of the sacred. The sacredness of our lives.” Through Sukey’s incredible projects, I can confidently affirm the value that arts-based projects can have in alleviating the process of ill-health experiences, in the

lives of those who take part. The lived experience and phenomenological impact of having health struggles can feel entirely dehumanising and debilitating. What I find awe-inspiring and quite profound about the projects that Sukey helps to create, is how she works with you, connects with you, and in conversation with you helps you to explore your experiences and to articulate and illustrate them beautifully. To help you reclaim your sense of self and find joy in your stage and situation in life too.

I think of people who experience health struggles that I’ve come across, patients on placement and in my personal life too, there’s a sense of detachment and depersonalization about their current unwell state. Even in chronic or terminal situations, they feel defined by an old version of themselves that they can’t return to and an increasing sense of resentment to their current state, which is entirely demotivating for making conscious healthy choices. I think taking part in arts-based projects like Sukey’s, rehumanises



and helps you find acceptance, contentment, and understanding of yourself, even in 'unfavourable' conditions.

**Understanding health rather than treating illness**

We talk about the process of understanding a person's experience of health, and how this is different from treating illness, which our health system seems to focus on. We talk about holistic, healthy life choices and preventative care, and how they're difficult to embed currently.

"It's really a shame because it was one of the wonders of the world, the NHS. But I think it's true of our society as well. We need to have stronger communities so that people don't have to do this ridiculous amount of multi-tasking just to get by."

"It's important that we have simpler, more connected, more caring, loving communities that are healthier. And that people feel supported by one another. And then I think people will be healthier because that's the way we're supposed to live."

With recent changes to our assessments, and with the BMA strikes, I wonder and hope this change will come about. That we may focus less on competition and that our environment induces less burnout, and we can incorporate and lean more on community. Medicine is, arguably, the ultimate career of compassion, so I hope this inherent empathy can be emphasised more; I believe incorporating more of the arts can enable us to do this.

**Would you say that arts are explored enough within the medical curriculum?**

Sukey and I have spoken before about the value of having more arts and humanities incorporated within the curriculum. "I do feel that it's the missing link. I've felt it for a while now. Because it never was divided. The arts and humanities and science were not divided before, people didn't do one or the other. Arts was always part of health. Because it makes things meaningful and also focuses everyone's attention."

We talk about the meaning that the arts help us to create in the field of medicine: as a way of building meaningful communication, as a propeller of motivation to inspire healthier lifestyle changes, and as a way of forming a sense of connection and understanding with a patient, instead of evoking fear and mistrust. I feel that the arts do help us to build techniques and understanding of how to connect with others to find meaningful ways for them to improve their health. Like having an active method for the motivational interviewing model that immerses the patient in a



Left: Series of photos from *Women of An Uncertain Age*  
Right: Photo from *The Savage And Beautiful Country*  
Sukey Parnell Johnson - All copyright reserved



way that creates a “sense of being valued as a member of the community”

“There just needs to be more joy in life as well, and it is more joyful when we do things together and when you let go like that. Particularly for medical students, you’re being pressured all the time, to be within rigid frameworks, for very good reasons. But there have to be places, where you can reflect and let go. Where you can be nourished again.” My experience with Sukey on my SSC provided me with this which is why I think incorporating more of the arts within the curriculum would be so refreshing.

### **How do you think we can incorporate more of the arts, within the medical curriculum?**

“To have a thread you can weave all the way through.”

“I think it would give you that release as well, in a safe space. I think that’s really important when you’re in a lot of stressful environments that you guys are that you know you have a place where you’ll not be judged, and you can still make it into something meaningful. It would be really nice to have that.”

In a cohort of over 500, where you seem to dis-

cover a dozen new faces with every lecture, with a tutor group that seems to disband at the end of Stage 1, and people you meet and become familiar with on longitudinal placements only to be reorganised the following year, it’s difficult to build a sense of belonging. Having a “thread” that provides us with a sense of “community”, “a safe space”, and “pastoral support through some artistic element” embedded throughout our time at medical school, does, indeed, sound wonderful! A place where we can find joy and be creative outside of the field of medicine in unison, and where we can see our progress and see ourselves “evolve” together.

Sukey tells me she feels she’s in a transformative state, ready to start a new creative chapter and is excited to see what’s to come. So am I! It is always such a pleasure and feels so revitalising and inspiring to be in conversation with Sukey. I sincerely thank her for taking the time to talk with me.

In the next edition, I hope to bring you an interview with Dr Alexandra Mermikides and Dr Katharine Low, the new heads of the Medical Humanities department here, to explore and reflect on their goals and ambitions for the department.





*Photos taken by Morgan Bailey*





Morgan Bailey **MBBS3**

*Event took place 24th March 2023*

I cannot remember the last time I watched terrestrial television. Indeed, so long ago in fact that the memory of the crackle of static with laser wand in hand had almost faded to black. Yet, with our enormous spirit and perseverance, our Guy's Men & Women (see index) stopped the final curtain call on a once Saturday staple – Take Me Out.

With our very own Paddy McGuinness behind the microphone (played by Mili Shetty, MBBS2), GKT Take Me Out launched itself onto the stage of New Hunt's House Lecture Theatre 1. In true GKT fashion, a bunch of keen and naïve female sporting Freshers appeared to play host to our male contestants (sorry, equality!) And with all things MSA, no cost had been spared in the procurement of lights for our contestants (red balloons & drawing pins... taking no lighty no likey to another level)



Taking to the stage were our most favourable Guy's men – that is to say, the only ones willing to endure 2-hours of public humiliation without the promise of a Baywatch or a perpetually playing 2013 music playlist.

For the sanity of our readers (and to avoid the threat of a GMC referral), I shall spare the ultimate details of what followed: alcohol of the juniper kind made an appearance, and a surprise serving of iceberg side salad.



Many of our men were indeed shown the door that night, with only a couple making it to the Isle of Nawaz (from the frying pan into the fire...)

Ultimately the night proved an extremely successful hit amongst NHH-goers, with the lecture theatre being fuller than on induction day.

A huge thank you to the GKT MSA Committee of 2022-2023 for saving our triumphant tradition from the Covid guillotine.

Let this serve rallying call to our readers to get involved in the next Take Me Out. More news to follow!



# Keats' Corner

## Free at the point of use

The humming of the air  
Fueled, by flame;  
To the scream of the bombs  
Dropped atop the maimed

The weary cries  
Alone; to no ear  
Let out, in futility -  
By children near

Their suffering meant,  
What we now hold dear -  
That Our service to health  
Reaches its 75th year.

Morgan Bailey **MBBS3**



Bronze statue of John Keats by Stuart Williamson on the Guy's campus in a niche from the old London Bridge. Commissioned to commemorate Dr Robert Knight (1932 – 2005), Guy's physician and admirer of John Keats. Dr Robert Knight was also previous Chairman of the GKT Gazette. Unveiled by poet laureate Andrew Motion in 2007. Photograph courtesy of Dr MD O'Brien.



# To Autumn

Season of mists and mellow fruitfulness,  
Close bosom-friend of the maturing sun;  
Conspiring with him how to load and bless  
With fruit the vines that round the thatch-eves run;  
To bend with apples the moss'd cottage-trees,  
And fill all fruit with ripeness to the core;  
To swell the gourd, and plump the hazel shells  
With a sweet kernel; to set budding more,  
And still more, later flowers for the bees,  
Until they think warm days will never cease,  
For summer has o'er-brimm'd their clammy cells.

Who hath not seen thee oft amid thy store?  
Sometimes whoever seeks abroad may find  
Thee sitting careless on a granary floor,  
Thy hair soft-lifted by the winnowing wind;  
Or on a half-reap'd furrow sound asleep,  
Drows'd with the fume of poppies, while thy hook  
Spares the next swath and all its twined flowers:  
And sometimes like a gleaner thou dost keep  
Steady thy laden head across a brook;  
Or by a cyder-press, with patient look,  
Thou watchest the last ooziings hours by hours.



Where are the songs of spring? Ay, Where are they?

Think not of them, thou hast thy music too,—  
While barred clouds bloom the soft-dying day,  
And touch the stubble-plains with rosy hue;  
Then in a wailful choir the small gnats mourn  
Among the river shallows, borne aloft  
Or sinking as the light wind lives or dies;  
And full-grown lambs loud bleat from hilly bourn;  
Hedge-cricket sing; and now with treble soft  
The red-breast whistles from a garden-croft;  
And gathering swallows twitter in the skies.

*John Keats*





# A Catalogue of Medical Terms

Sir Vical Smear **M.D., F.R.C.S.(Ire)**

As junior medical students enter upon their clinical studies, they will encounter the remarkable phenomenon known as medical shorthand. Ask and you will be told, but some of these epigrams contain more beneath the surface than one would imagine. So, here is a short guide to some of the commoner terms and their real meanings.

## Common Terms

Family history — nil relevant: Forgot to ask.

Unco-operative patient: I forgot to take off my name badge saying “Medical Student”.

Pleasant lady: The patient liked me.

Nervous and irritable: The patient didn't like me.

Obese: I used to think I was fat, but you should see the size of this old dear.

Genitalia Normal: They look about the same size as mine, but you wouldn't catch me handling them if you paid me.

On examination, NAD: This patient is a young man who has come in as a day case for a gastroscopy.

On examination, followed by two pages of negative findings: This patient is a young lady who has come in as a day case for a gastroscopy.

L°K°K°S°: This was what the houseman found

and, although I don't know what it means, it looks good in the notes.

Absent breath sounds: Was listening with the bell of the stethoscope whilst the lever was turned over to the diaphragm.

Planter reflexes absent: Ticklish feet.

Grade 2 systolic murmur: I could just hear it provided the ward was quiet, but then I noticed my stethoscope tubing was rubbing on the bedclothes.

Grade 1 systolic murmur: Easily audible after the consultant has drawn a circle where you should listen.

Prawdewicz-Neminski sign absent: Just to keep the Junior Registrar on his toes.

Fundi not visualised: Ophthalmoscope batteries were flat again.

Perla: This patient has neurosyphilis.

PR normal: Patient thought I had finished examining him and nipped off to the TV room before I could find the lubricating jelly.

Erythematous wheals on trunk: I really must get my fingernails cut.

Fixed, dilated pupils: The patient arrested while I was talking to him.



## Bad Medical Jokes

Sciatica can Lumbar you  
for life.

Hypodermics are all right.  
But they get under your  
skin.

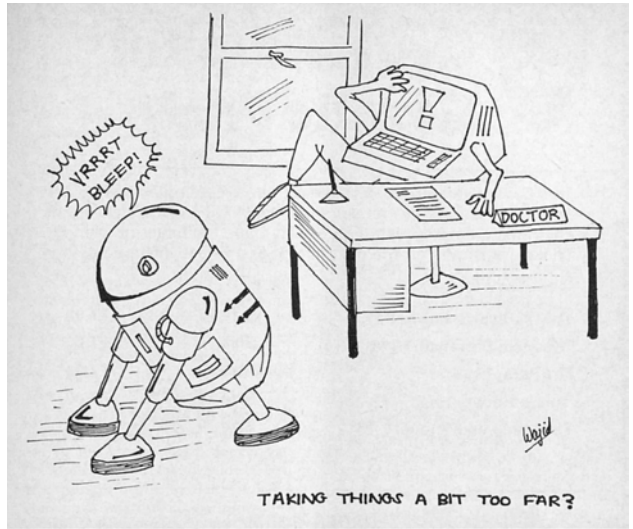
If you're unfortunate  
enough  
To swallow a teaspoon.  
Lie down on the bed  
And don't stir.

"I've not been feeling  
myself recently, doctor."  
"I'm glad to hear that:  
it's a nasty habit you had  
there."

A medical student from  
Caius  
Passed all his exams with  
great ease:  
Now he's working at  
Bart's  
Putting valves into hearts.  
And collecting exorbitant  
fees.

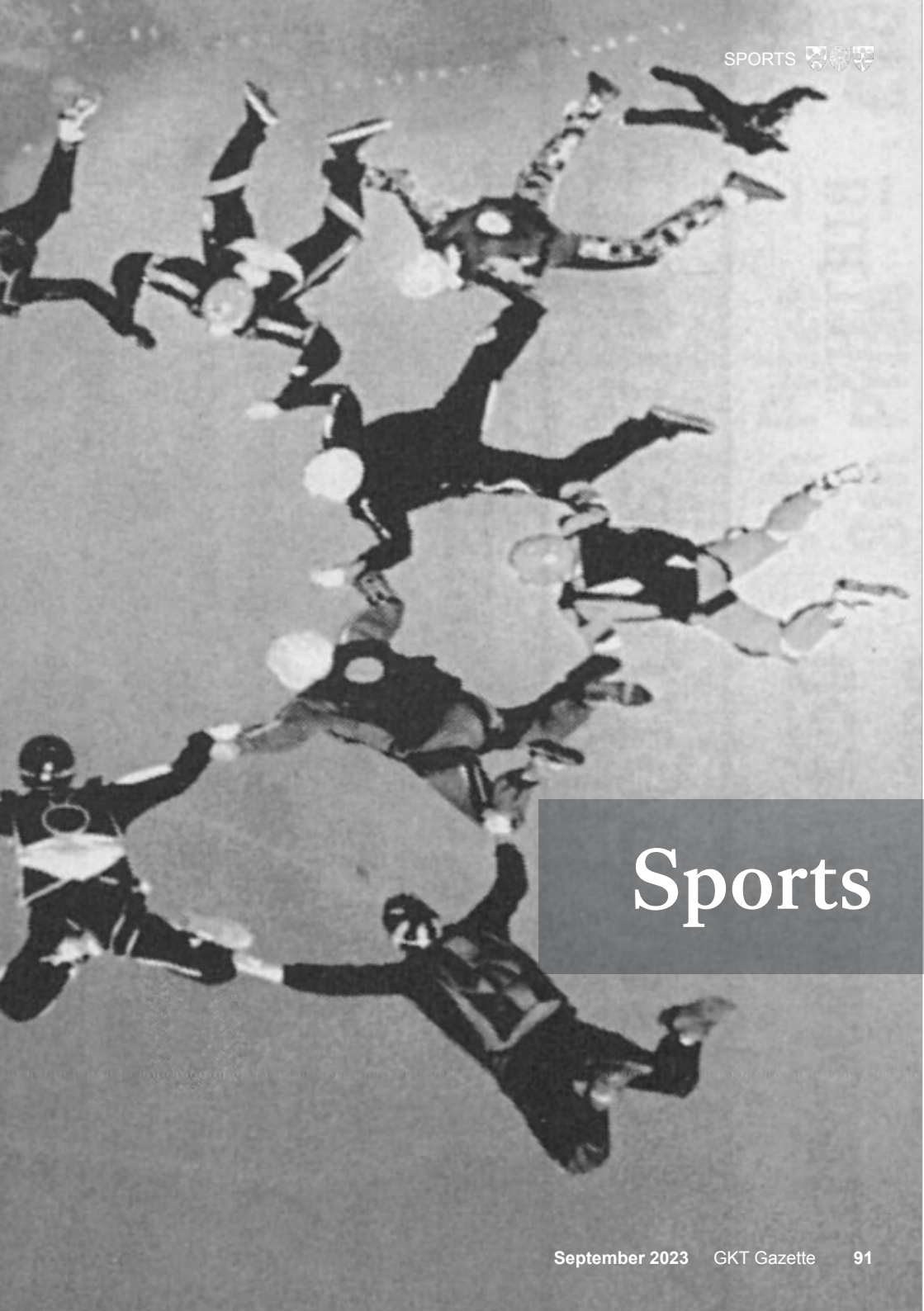
Old Professors never die.  
They simply lose their  
faculties.

The Administrators are  
playing a new game called  
Bureaucracy and the first  
person that moves loses.



*Photo: Guy's Gazette Volume 103 No 2390 - March 1989*





# Sports



# Sports Clubs at GKT: A Small Overview

Sami Lewis **iBSc Anatomy**

*On these pages we have collated a small snapshot of the sports teams available at GKT. There are many others not featured here, full details are available on the Student Union website - KCLSU.org*

## GKT Men's Rugby Club

GKT Men's Rugby Club, the Oldest Rugby Club in the World (Est.1843), has been proudly and strongly represented by students from KCL since its formation.

We cater for players of all abilities, from beginners to academy players; whichever level you are there is a team for you. We are a team for ALL students, regardless of what course you study at King's.

We have a 1st and 2nd team competing in the BUCS leagues. As well as this, we have a Saturday team where players can develop their skills. The main cup competition we play in is the United Hospitals Cup (the oldest rugby cup competition in the world). Elite 1st team players can play for the United Hospitals Rugby team, competing against the likes of Oxford, Cambridge and other top university sides.

Joining a sports club at university is one of the best ways to meet friends, and rugby is no exception. The social calendar for rugby is packed with great opportunities to make lifelong friends. 2 tours each year, an annual black-tie dinner, and countless other socials mean every week is sure to be one to remember. Our extensive alumni network differentiates us from all societies at KCL, and you'll be a part of the club well after graduation.

*Contact: [george.ashton@kcl.ac.uk](mailto:george.ashton@kcl.ac.uk)*

*Instagram: [guys\\_hospital\\_rfc](#)*

## GKT Men's Football Club

Looking to play football next year? Look no further than GKTFC.

GKTFC has 5 teams that accommodate for all different skill levels. So whether you're looking to play competitively or fairly casually, there is a place for you at GKTFC. Although we are a medics team, we accommodate players from ALL degrees with around half our players being non-medics.

We compete in BUCS leagues, LUSL leagues, the National Association of Medical Schools Competition (NAMS), the United Hospitals Cup (the second oldest football competition in the world), Varsity (vs UCL) and Macadam (vs KCL). As you can see, there's plenty of football to be played. We are the current holders of the UH Reserve Cup, UH Plate and Macadam Cup. Off the pitch, we pride ourselves on our social life with events at least once a week, often involving other sports teams, and an International tour in November. This means GKTFC is the perfect opportunity to make friends and these bonds that are formed usually last for life, just ask our old boys.

*Contact: [K1923138@kcl.ac.uk](mailto:K1923138@kcl.ac.uk)*

*Instagram: [gkt\\_fc](#)*

## KCL Boat Club

KCLBC is a very traditional and unique club, with opportunities for all members of the community; rowing at both competitive and social levels, novice and senior rowing, coxing, and just being part of the fun as a social member. We pride ourselves in our commitment to training along side being a social and welcoming community.

Recently, our Senior Women Qualified at Henley Women's Regatta and have won UH events throughout the year, and our Senior Men have been UH winners in many of the smaller boat categories too.

Our Social Calendar is full of events including formal dinners, boat parties, weekly trips to Guy's Bar and our Annual Cambridge Tour.

*Contact: [charlie.richards@kcl.ac.uk](mailto:charlie.richards@kcl.ac.uk)  
Instagram: [kings\\_rowing](#)*

## GKT Women's Rugby Club

The oldest rugby club in the world - but cooler because we are rugby girls! Whether you are a seasoned pro (like our captain) or a newbie (like our president), GKTWRFC is the place for you. Having having an amazing season of socials, many rugby wins and honestly hating mud, we now want you!

Our club offers a jam-packed schedule: we have training twice a week, match days Wednesdays and Sundays (opportunity to play with Hammersmith and Fulham WRFC), themed socials on Wednesdays at GB and DC Fridays. Add in tour, annual ball with GHRFC, summer social, Christmas dinner and a million other things - guaranteed you will see us more than your flatmates.

Please do come down for fresher trials and taster sessions and give GKTWRFC a proper go!

*Contact: [krushi.pandya@kcl.ac.uk](mailto:krushi.pandya@kcl.ac.uk)  
Instagram: [Gktwrfc](#)*



# Professor Richard JW Phillips Obituary

*Professor RJWP passed away peacefully Tuesday 15th of August 2023. To honour his memory and contribution to the GKT family, we have included tributes from Richard's former colleagues, friends and family.*

## A Tribute from Dr Elaine Gill

Richard was my work colleague for 23 years and friend for 25 years. It was without doubt my privilege.

Richard cared for our medical students with empathy and kindness in both positive and challenging scenarios. He offered the same virtues to colleagues with quiet acknowledgment. I was lucky to be on the receiving end myself at times over the years and I cherish those moments.

He demonstrated a willingness to accept peoples foibles and see beneath them offering non-judgmental views serving people in almost all circumstances. Richard was patient and a great listener and equally loved to talk. We spent many hours over the years sharing work and personal ideas, concerns and stories.

He loved the clinical communication sessions and with well known regularity Richard's simulated patient/carer would fail to materialise on time for their next group. This resulted in a facilitator hunting around for their simulated patient who would still be with Richard's group enjoying the conversations! Richard would catch up with Bernadette (Dr Bernadette O'Neill) or me afterwards sharing his enjoyment and satisfaction of being with the students.

He never lost his sincere interest in mentoring, supporting and advising students to help them progress in their medical careers as rounded people.

Richard was a wealth of knowledge and experience in the life of the Medical School from Deputy Dean to detailed clinical assessment.

His passions outside of Medical Education included ballet, opera and other performing arts. He loved holidays in the sun and wore a suntan with style as always. Family and friends remained important to him.

Richard was complex, kind, intelligent and open minded. I valued him enormously and he will be missed by all of us who knew him.



Graduation 2016; photo by Ruth Sugden

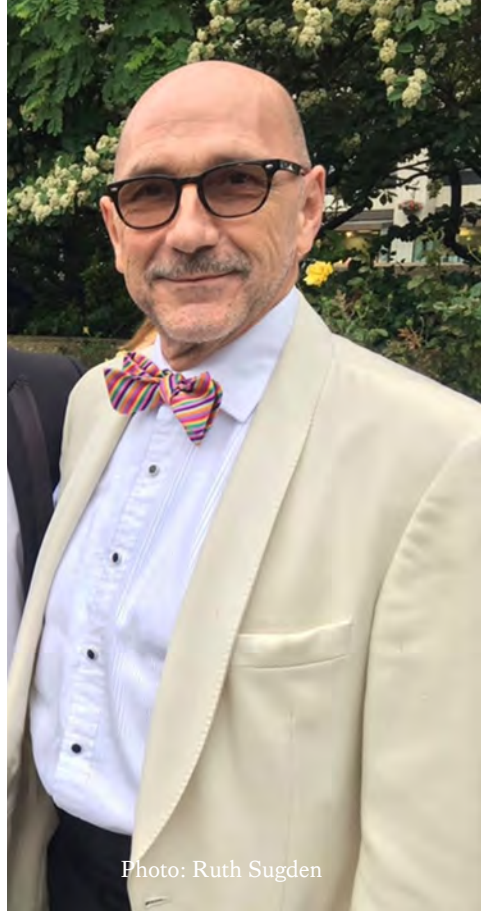


Photo: Ruth Sugden



At La Vache open air opera September 2022.  
photo by Ruth Sugden

### A Tribute from Ruth Sugden

I have known RJWP for over 20 years. In my family he was always 'your Richard, mum' he knew my three children and was loved by us all.

Richard was my boss, my line manager, my colleague and most importantly my friend. I could ask him anything and he would always have time to answer. Never one to use 5 words where 500 would suffice we would joke that, when chatting on the phone one of us would say: I must go now, it's half past April already!

We shared a love of the arts too. Richard loved and was incredibly knowledgeable about opera and ballet. he always bought pairs of tickets so he could take someone along. I was often the lucky recipient. I took him to musical theatre! Which he found amusing! We went to galleries, the ROH, Glyndebourne and Wigmore Hall. We went to conferences and ex-

plored the cities. He came for Christmas lunch. Richard and I set up The Phoenix and Karabiner Groups to support medical students who were struggling with their studies. We would compare notes on how they were doing and discuss how to help them more. Many, many students kept in touch after they had graduated

I hadn't realised just how often we spoke, sent texts or generally communicated. I miss him terribly. Every day.



### A Tribute from Dr Gabrielle Adkins

Professor Richard Phillips (known to many as RJWP) was a hugely respected teacher and mentor to generations of medical students at GKT. His compassion knew no bounds, and as Head of Final Year during my time at King's, his dedication to medical education was immediately apparent.

Having needed to repeat my final year at King's, he sat with me quietly and calmly as I processed this news on results day. Just his reassuring presence made me feel as though this was a hurdle I could overcome, and I will always be incredibly grateful for his unwavering support.

The following year I re-sat my exams and won the Gold Medal, which was testament to his determination to see our cohort succeed. Just over 2 years later, having finished my foundation training and dealing with a significant health issue, Professor Phillips got back in touch with me. Knowing that I needed a distraction, and that I wanted to keep to normality as much as possible, he sought to involve me in a teaching project at the medical school.

I only learnt recently of the tremendous work he had undertaken in the community prior to his roles at King's, and this certainly came as no surprise to me - compassion was at all times at the heart of the work he undertook.

His legacy will never be forgotten within the King's community, and beyond.

### A Tribute from Professor Debbie Sharp

Richard and I met in the autumn of 1975 – when he came to Oxford from Cambridge to do his clinical studies. I was a year ahead of him but we knew each other – it was a very small medical school. One thing I remember was his involvement as administrator and other roles in the medical school pantomime – Tingewick (spelled differently each year by convention) – and I have unearthed the programme from the year he was quite involved (shown on the right). Our paths diverged then – we actually both went on to careers in hospital medicine. And both of us then decided that General Practice was a better fit.

And to my surprise and delight he turned up at the Lambeth Road Group Practice, as a GP trainee in, I think 1985. I was a lecturer and the practice housed the academic department of GP. We became firm friends and spent a lot of time together – eating, seeing friends, listening to music etc. I had my son Oliver in 1991 and asked Richard to be his godfather. We obviously saw less of Richard when we moved to Bristol in 1994 but as his family lived in Cardiff he was up and down the M4 and often stopped in to spend time with us. He also visited us at our house in France. His love of music expanded and we went to Glyndebourne together on more than one occasion. And of course to the Royal Opera House when I was still living in London.

Although Richard enjoyed his clinical work as a partner at the Linom Road practice in Brixton, his career really took off as he became more and more involved with the teaching at GKT. As an academic GP myself, we had many long chats about medical education over the years – the last being when his godson and I saw him at home just a couple of weeks before he died. He was a dedicated teacher and loved his work. I can't tell you how wonderful it was to see him made a Professor that night.



1976



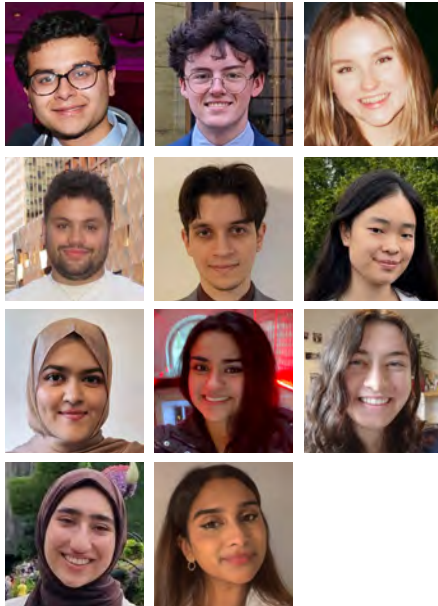
# TINDZWIK



& THE MAGIC LUMP  
or  
The Bleeping Beauty

A  
GROSSLY-INFLATED  
PRODUCTION

*Photo kindly provided by Professor Debbie Sharp*



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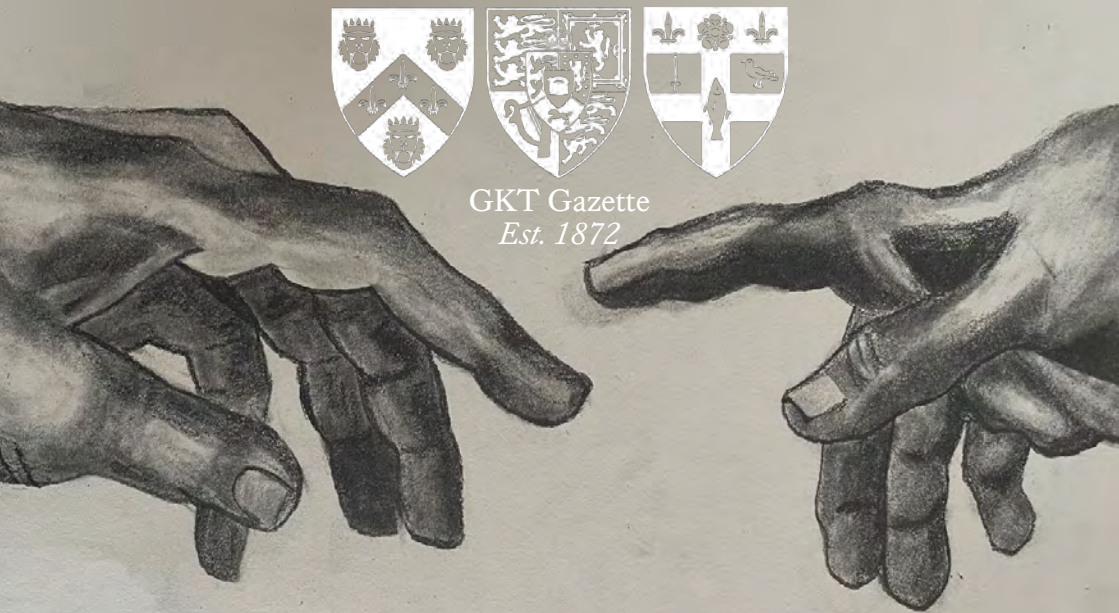
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